

DOCUMENT RESUME

ED 055 059

SP 005 296

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TITLE Creating Humane Schools.
INSTITUTION Mankato State Coll., Minn. Wilson Campus School.
PUB DATE Jan 71
NOTE 287p.
AVAILABLE FROM Campus Publishers, Box 1005, Mankato, Minn. 56001
(\$5.00)

EDRS PRICE MF-\$0.65 HC-\$9.87
DESCRIPTORS *Educational Change; *Educational Innovation;
*Experimental Programs; *Guidelines; *School
Improvement

ABSTRACT

This document, a revision and retitled version of "Implementing Different and Better Schools," 1969 (ED 051 110), attempts to provide guidelines for change in schools to help those educators who need to be convinced of the need for change, 2) those who are ready but need to be told what to do, and 3) those with some experience of change who need additional ideas. The material is organized in four major sections: 1) "Introducing Challenges for Relevant Educational Alternatives," which includes the description of one specific school program to indicate that the ideas set out are practical and not theoretical; 2) "Why Innovation and Research Demand Priority," which explains why a great deal more innovation is necessary in all the schools of the country and analyzes present practices and offers suggestions for evaluating program effectiveness; 3) "How Guideline Recipes Achieve Optional Patterns," which identifies 69 changes, both general and specific and discusses them briefly in six groups of components: philosophy, instruction, learning, structure, technology, and reporting; and 4) "Summarizing Commentary with Descriptions and Bibliography," which includes extracts from two articles on innovative schools and an extensive bibliography divided into two parts, "Literature Answering W" and "Books Suggesting How." (MBM)

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CREATING HUMANE SCHOOLS

A complete revision of the book formerly titled, IMPLEMENTING
DIFFERENT AND BETTER SCHOOLS--Campus Publishers, 1969

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Published by

Campus Publishers
Box 1005
Mankato, Minnesota 56001

Printed by

D.M. Printing Company
1609 North Front Street
Mankato, Minnesota 56001

January, 1971

9625005

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SECTION A

INTRODUCING CHALLENGES FOR RELEVANT EDUCATIONAL ALTERNATIVES

Chapter 1

Explaining This Revision

This book is a fairly complete revision of the paperback publication, Implementing Different and Better Schools, by the same author, produced by Campus Publishers, December, 1969, and revised in April, 1970. Though the book sold many copies in its brief existence, covering 47 states and seven foreign countries, and was continuing to receive good support, a complete reorganization and approach was felt desirable, even to the extent of a new title.

There were three basic reasons for this need: one had to do with the general mechanics--organization of the material, repetition, and style; the second, and one that should always be present in the ever changing innovative efforts in schools, was the development which had occurred in education during the two years it took to write and publish the volume; but third, and most important, came from the many requests to separate the "why" from the "how."

The overall comments about the original book have been overwhelmingly supportive in relation to the ideas, concepts, beliefs, and guidelines suggested. But more and more educators, as related to change, are falling into three categories: (1) those who still need to know why schools must change, or who want a rationale for change to help convince their communities; (2) those who are ready for change but who want some how-to-do-it recipes--what changes and how do you achieve them; (3) those educators who have had some experience with the newer revisions in the schools and who now need to exchange their ideas, programs, and knowledge with others interested in innovation, as a way of dissemination of information and further retooling.

These reflections led to this revised approach with the more precise title of Creating Humane Schools. Section A is introductory in nature, designed to explain the need for the book and to show in Chapter 3, through a description of one specific school program, that the suggestions in this book are practical, not theoretical. The ideas do work in most situations and can usually be implemented in rapid, dramatic fashion.

Section B has been pulled together to provide answers for those looking for help in developing a rationale for change. It attempts to explain why a great deal more innovation is still necessary in all the schools of the country. Certainly those yet labeled "conventional" need great revision, but so do those currently described as the "most innovative"; in addition, the dozens of institutions which achieved great change in the past, but which have now reached a plateau, and those schools or projects presently creating their own innovative programs in an effort to help develop an entirely new educational system for the United States must seek new horizons.

Section C is an attempt to provide recipes, though this effort is almost an impossibility. The field of education has no planned mechanism for achieving change. What is successful for one innovator does not work for another; nor do the same tactics work for the specific situation. Another reason that recipes are difficult is the time element. Chapter 22 advertises 69 magic elements of change. Whether there are actually only 6 or really 106 is not the important issue; the problem is that to try to explain all 69 of the listed elements in how-to-do-it recipe form could occupy at least 69 fairly extensive booklets.

For example, a manual on one of the changes, daily smorgasbord scheduling could easily fill 50 to 60 pages of the same size found in this book. Each of the elements are important enough to warrant that kind of attention. But when one tries to work in a so-called innovative school, engage in some speaking and consulting activities--as always seems to be part of the reward--there is just not enough time in the year, and the years go by.

What has been attempted in this revision is to identify some of the changes, both general and specific, and some of the how-to-get-started ideas, and discuss them in short chapters. Someday the opportunity may come to write extensively in all 69 areas to show that the concepts and ideas are practical and can be achieved in any type school--big, small, inner city, suburban, exurban, rural--with any type of racial, economic, or religious mixture as related to the students and the community.

Each month new books, pamphlets, articles, and proceedings are being published about changes in education. More and more information is appearing with specific recipes. The topics selected for this manuscript are those which seem to appear most often during question and answer sessions with individuals and staffs attempting change. Hopefully, more teachers and administrators at the "grass-roots" levels will start to disseminate the methods, models, and guidelines already developed and in use in a number of schools; practical, workable suggestions are one of the great needs in education today. One person writing one manual cannot hope to accomplish the goal.

Section D, a summary, relates to the spread of information through a general bibliography and some published descriptions of the school in Chapter 3 to further show that the guidelines appearing in this book are practical, useful tools for achieving change. They are the ones the author has learned over the past twelve years of personal experience with the national change programs, and in actually helping to develop a number of schools which have been labeled "highly innovative."

Previous attempts in organizing bibliographies have run the continuum from attempting very specific listings under such topics as non-grading, scheduling, individualizing instruction, affective domain, planning, evaluation, and other similar terminologies, to just a general alphabetical listing of books by authors. In this volume, only two broad subdivisions have been attempted--one a collection of those aiming more at "why" change, including many from sociology and psychology--and the second containing those which aim more at "how," with emphasis on the type usually used by educators. However, so many books "cover the waterfront," as this one does, that it is really impossible to be accurate without a great deal of cross reference cataloging.

Further, no attempt has been made to include the excellent articles published in such journals as the Kappan, Educational Leadership, Learning Disabilities, Research Bulletin, Instructor, School Management, the journals of the secondary and elementary principals associations, the national monthly household magazines, as well as other media adding to the growing library of books, tapes, and films on change. Many of these, however, are referred to in the books listed in the bibliographies in Chapters 24 and 25.

Finally, this revision, though completely reorganized, and with a new title, certainly makes no claim to be "new." Much of the content is the same. In fact, many pages and some chapters remain intact. Often the material has just

been shifted to a different chapter. However, the information has been updated; a number of new ideas and concepts are included; several completely new chapters have been added; and the organization has been streamlined to enable specific information and recipes to more easily be identified. The original version was written with the focus on the process of change; this effort deals more with the mechanics of the innovations.

There is still some repetition. Ideas used as illustrations of why schools must change are sometimes repeated in slightly different form to describe how to make the change. Hopefully, this referral to previously used examples will provide continuity to show that in changing a school, those involved must understand the "why," the "what," and the "how," and that theory is completely interwoven with reality in the practical application and the everyday excitement of the new kind of school.

The original version of this book was written purposely in a smorgasbord approach. Change is a smorgasbord; you start putting potato salad, cottage cheese, cole slaw, beans, carrots, ham, roast beef, chicken, shrimp, and more on the platter until it is overflowing; individual items are hard to find, and the entire plate looks chaotic, but good, exciting, and inviting. However, for many their first encounter with a smorgasbord is a frustrating experience. Thus came requests for a book that would spell out in more detail how to achieve change through the standard menu formula rather than through a smorgasbord.

This volume is an attempt to do that. These introductory chapters are meant to serve as the hors d'oeuvre; the why section is intended as the soup and salad; the how section includes the meat and potatoes; and finally, the summary is the dessert. In other words, this book hopefully provides some help for those who prefer the nine course meal to the smorgasbord. Both approaches are good--both are needed; but regardless of which method one chooses to follow, there still is no real mechanism for change. However, we are getting closer.

But more than anything else, this book is a plea for maxi-education. Dr. William Alexander of the University of Florida has described present educational efforts in terms of women's skirts: mini-education, the kind we have had for many years, like the mini-skirt, covers the bare essentials, but leaves much to be desired. Midi-education, those attempts made by the many team teaching, modular scheduling, open pod efforts of the 60's, like the midi skirts, cover more and leave less to be desired. Though these schools, which still form only a small portion of the programs in America, are generally great improvements over the mini schools of the past and present, they still did not and have not gone far enough. What Dr. Alexander suggested as the next step was the maxi--a school which would cover most all and leave little to be desired; maxi-education would find school programs developed around humaneness, relevancy, options, and alternatives.

No public school in America is a maxi school yet; a few are trying to break through the lock step of the mini and midi restrictions. Chapter 3 of this book briefly describes just one such current effort. It is not a maxi school, but it does indicate that present theory can become practice. The new ideas, technology, and developments coming in the 70's will soon make the school in Chapter 3 and many of the ideas in this book very obsolete. We must all dream toward 1999, hoping that by 1980 we can have programs which will prepare individuals not only for the present society, but for living in the world of the 90's. The 70's must pave the way; regardless of how "innovative" a school now professes to be, it already belongs in the pages of past educational history.

The coming maxi school is possible. It is with this plea then, that all schools--whether they now consider themselves mini or midi--really begin further dramatic retooling so that we can reach the present portraits of maxi education by 1980 in order to be prepared for tremendous, fantastic, revolutionary change which will descend upon education in the last twenty years of this century. The private "free" schools are not the complete answer; ALTERNATIVES MUST BE PROVIDED WITHIN THE PUBLIC SCHOOL SYSTEM. The 70's will see the trend toward open schools, while the 80's will add vast technological developments. The 90's will bring an end to the current fifty year cycle, setting the stage for another round of innovations in the early years of the 21st century.

In the pages to come we are going to be discussing different curriculas, different school organizations, and different human relationships. The focus should be on the adult-youngster, adult-adult, and youngster-youngster roles, preceptions, and relations. The adult will sometimes be called a teacher, or a consultant, or an advisor, or a counselor. The youngster often will be called a student, or a learner, or a child, or a he or a she. These intermixed terminologies should be no barrier, for usually a concept is learned best when it is taught, and therefore the learner should be a teacher. The important factors are learning, the enjoyment of learning, the learning process, and the human relationships which are established between two or more persons who are learning together.

Chapter 2

Those Who Dream

In 1943, Dr. Fred G. Bratton wrote The Legacy of the Liberal Spirit, one of the truly outstanding interpretations of freedom and liberalism. He felt the volume came under the category of "necessary," for in it he attempted to describe the spirit for which the allied nations were at that moment fighting to defend; he sought to interpret the history of freedom in its most critical stages.

Today America faces further crises--in its total society, and in the schools of that society. Though these crises are perhaps not as crucial as defeat would have been in World War II, nevertheless, they are issues for which we must seek answers. The present schoolhouse in America needs to go the way of the dinosaur; it is well into the period of obsolescence. But boys and girls still have a need for something we call education. It is in this spirit that this book is justified as necessary--it is an attempt to evolve a replacement for the dinosaur--to develop a school program--whether conducted within the traditional school walls, or in another facility or area of the community--that truly is significantly different and significantly better.

Schools are not the only part of the society calling for change. In the past few years, America has witnessed many individual and national calamities. We have been sorrowed by the deaths of the troops in Vietnam, by riots and shootings on college campuses and bombing in cities, by accidental personal tragedies in everyday living, and by the shocking assassinations of men like John Kennedy, Martin King, and Robert Kennedy.

Each of these men, as have others before them, had a dream; they dreamed of a better world, of a better life for those in need, and of a better nation for all. True, they gained personal recognition and power, but this was not their driving force; in no way can their personal gains balance the sacrifices to their families and to themselves as they attempted to provide leadership toward a better society.

Their Ideals, their Beliefs, their Dreams, which were sometimes criticized, scoffed at, and even made the brunt of ridicule and laughter, and which sometimes were planned or implemented incorrectly, were none the less great goals for the nation. The goals have suffered a setback, but they will not be stopped by their deaths. It is up to those who follow to see that the ideas become realities.

We in education can in no way measure the problems of the schools with those faced by the world as a whole, and those of the total American society. But we do have demanding issues. The time has come for educators to dream again, but this time to reach for newer, greater, and higher clouds--to dream of significantly better schools. No longer can we content ourselves with the kinds of schools we have now in the United States. No longer can we content ourselves with the snail's pace of change. We must do better, and we must make the improvements faster than ever before.

And if we in education can improve, perhaps we can contribute ever so much more to the dreams of those who envision a better America. Not only must we dream of

the future, but we must implement many of those dreams now. We must have a commitment to action. We must stop petty bickering about Carnegie Units, B minus grades, and the length of the lunch period. The time has come to dramatically change the educational system. We must search deeply for answers as to how we can make more significant contributions to the society. Giving students the ability to read, to compute, and to respond to examinations is not enough.

This book has been written for those who dream about better, more humane schools. Further, it is a way of saying thank you to men like Dr. J. Lloyd Trump, whose lifetime of dedication to the vision for better schools has especially inspired many, many young educators over the past fifteen years; but even more it is a way of saying thank you to those students and teachers at the Canyon del Oro School in Tucson, Arizona, whose dreams of living in the most exciting school in America were never fulfilled because they were deserted by their school board, parents, teachers, and administrators; additionally, is a thank you to those students and teachers in Port-au-Prince, Haiti; Taipei, Taiwan; University City, Missouri; the Lake Region of South Dakota, the Wilson School of Mankato State College, the administration at Mankato State, the author's audiences at conferences in 36 states, all of whom have listened to constant criticisms of their slow efforts to improve each day the educational experiences of Pete and Sally. It has been these students, parents, and educators, in these communities, who have taken time to listen and to try, who have made the practical application of theory possible; to them this book is dedicated.

The chapters which follow are generally not about one school or the author's current efforts in innovation, except where such comments might serve as a practical example; rather they attempt to describe how teachers, administrators, school boards, and parents in communities in every state in North America can achieve rapid revision of their current programs as soon as that need is identified. This book does focus more on helping change the "conventional" schools, but hopefully it will help cause a renewal of energies in many of those labeled "innovative"; so many of the change efforts, especially those which were among the early pioneers, are now in a rut and no longer progressing forward; many fine programs developed in the early 60's, such as modular flexible scheduling, now face obsolescence in the 70's.

From time to time throughout the book, reference will be made to a particular current program as illustrative that change can occur in very practical situations; most of the examples given are only one avenue. For example, Chapter 3 is a description of the 1970 Wilson program. Hopefully, the point will be clear that no one is advocating this specific approach as "the answer"; it is only used to show that the experiences the author has had the past twelve years in personally helping implement innovative programs in Spain, Taiwan, Haiti, Arizona, Missouri, South Dakota, and Minnesota, and as a consultant to over 200 other districts in many states and provinces, experiences which are used in this book as the basis for suggesting to others possible ways to create more humane schools, have received the practical test of reality.

No one is asked to agree with all the concepts, ideas, methods, models, or recipes presented. The only intent is to convince educators and the public in general that schools can change, and must change, and that improvement can be made overnight, even in a "hard-core conservative" area, if educational leaders will put the innovative efforts, theories, and research of the past four decades into practice.

Present conventional schools are among the most inhumane institutions in America. They closely rival the prisons; the only difference is that after 3 p.m. and on

weekends we let the prisoners escape. Visit a prison, and then go immediately to a conventional elementary school from 9 to 10 a.m. It is possible to have target practice--even shoot a cannon down the halls; no one will get hurt. The warden has ordered the guards to keep all the prisoners in their cells from 9 to 10. It isn't exercise time. Everyone knows that the only valuable activity in a conventional school at 9 a.m. is reading; the special music teacher had better not try to interrupt class during that hour; the specialist may end up in solitary confinement.

A minority of schools throughout the nation in 1970 are attempting to create humane alternatives. The reason these educational programs are undergoing dramatic overhauling is that it has become more than obvious that schools have become inhumane institutions. The early chapters portray some of the questionable conditions forced upon students over the past and present years in the majority of schools. Later chapters attempt to describe a few of the steps that can be taken to correct some of the flaws. The task of each educator is to determine how their individual efforts can help create a more humane program for the students in the public, private and parochial schools of North America.

Fortunately it is true that especially during the past ten years there has developed a growing commitment to change. But because we are moving at a relatively slow pace in revising schools, the decision was made to try in this book to express as enthusiastically as possible on paper, WHY schools must change, WHAT changes must be made, and HOW they might best be accomplished. Unfortunately, it was not possible to include many illustrative visuals which might have helped to explain a number of the comments. Further, though Section C is marked as a "how-to-do-it" effort, in this manuscript no attempt has been made to spell out line by line how a specific school was changed; the actual step-by-step procedures vary from school to school, are primarily mechanical, and with dedication and hard work can easily be learned by creative members of the staff. For not spelling out such step-by-step detail each of the 69 or more revisions under way in education, some have criticized this effort as just another theoretical book. This is far from the truth; remember this is an effort to talk about change by one who has been on the firing line of change--in the public schools during the past several years--and who prior to these retooling days worked in conventional schools, thus providing some subjective measure of comparison.

One of the biggest obstacles to changing a school is lack of a real commitment to an innovation philosophy. This statement is not theoretical; many teachers and administrators get impatient when change is discussed because they want to know "how"--they don't want the "philosophy." But usually these educators soon are lost; they do not make the effort to really understand the rationale for a change, and thus quickly say "we couldn't do that here," or "we must move more slowly." Before any change can be successful, there must be commitment; thus part of this book stresses the why of change. Once educators understand the why, they can turn to what changes should be made; after that, they are ready to study the how of change, realizing that the how has two parts: (a) the process of change; and (b) the mechanics of change.

Hopefully this book is all practical and not theoretical. Hopefully it has the proper balance or blend of the why, what, and how. If the reader will consider carefully all of the materials presented in the various chapters, the parts will fit into a whole. There has been a very definite attempt to specifically and generally describe both some of the processes and mechanics of changing individual schools; the ideas which are presented are applicable to all age levels: the traditional elementary, middle, and high school years.

Until just recently, for whatever value they might be, there has not been time to summarize the convictions gained through personal experiences in changing schools; unfortunately, those teachers and administrators who are now meeting the day-to-day problems which develop when starting massive new programs usually do not have time to write. Some of the most valuable "how-to-do-it" materials are not on the market today simply because those on the firing line do not have publication time and outlets. Most of the books on change currently available in the bookstores have been written by college professors who are not on the daily school production line, or by principals who developed one program, wrote about it, and then went on to other pastures, such as superintendencies, consultantships, college teaching, or private foundations. Very few of the original grass roots "change agents"--those principals, for example, who started a school in the direction of innovation ten years ago--are still directing a public school. They have left the implementation of innovations to those who followed them. Fortunately a few of the early leaders of the 60's are returning to the battlefields for the challenge of the 70's.

AS a result of the change leaders moving often, most of the so-called innovative schools of today are merely replicating patterns developed by the early innovators five to ten years ago. A specific example is the switch to modular scheduling. The type of plan which Stanford University and Marshall High in Portland started several years ago is not new, nor is it the latest, nor necessarily the best. Individualized learning and smorgasbord scheduling offer much greater promise. But all over America, schools are just now adopting modular scheduling as "new." Speeches given several years ago on large group and small group methodology, open labs, unscheduled time, independent study, and open pod facilities are no longer new. In fact, in many communities those speeches are far out of date; but, unfortunately, they are still valid in the great majority of schools and being used by many to explain programs to those who are yet operating traditional programs.

The Nova, Marshall, Ridgewood, Walker, Meadowbrook, Granada, Melbourne, Brookhurst, Abington, Evanston, Ferris, Fox Lane, Roy, Lakeview, University City, Thomas, Oakleaf, Matzke, Canyon del Oro, and all the other explore schools--the early, exciting attempts to change American education--as good as they were or might still be, are already obsolete. These types of schools and their teachers and students were real pioneers. They showed that we could change schools; they did not prove they were better schools, but they did prove we could develop different, alternative ways of educating boys and girls. And their efforts will not be lost; they provided the breakthrough to enable eventual development of schools which will be truly significantly better. But these are not the kinds of schools we should be developing now. We ought to be able to build upon their experiences and go far beyond. We need some new types of pioneers--to show that though many of these ideas developed in the original staff utilization schools are still applicable, they are now only stepping stones to what must come soon in a more humane society. Unfortunately most schools changing now are adopting 1963 programs, when the focus should be on the new developments coming in the 70's. Certainly the psychologists, sociologists, and other observers of the current educational scene are not advocating the 1960 model. Where are the 80's? How accurate is the Philco-Ford production of the movie titled 1999 AD, when students may attend a "formal" school only two days a week.

The research currently being published, the efforts of Title I, II, III, IV, and V of ESEA, and the findings of psychologists and sociologists are helping the cause of change. Popular magazines are aiding by writing feature articles, using the ideas developed by many of the leaders of innovative schools, but who unfortunately were not heard under their own bylines because they lack a publication

outlet. Fortunately for education, these lay writers are finally talking about the year 2000. As more schools begin to switch, as we implement the ideas of the 70's, the current literature will be badly in need of revision.

Why then another book on how to change a school as we begin the 70's? The reasons are twofold: first, only 30 per cent of the schools have in some way moved into the innovation stage, and most of those are just in the fringe stages. Probably only 15 per cent of this 30 per cent are really deeply and significantly involved in change. Another 40 per cent are talking about some changes; they are becoming aware of the need but are sitting on the fence. The other 30 per cent are still resisting change--they are content with the status quo. The second reason for this book is the great disappointment in the results of so-called innovative schools; the results found in the 15 to 30 per cent who have a reputation for new programs have not been sensational.

As educators have an opportunity to travel in America, many are immediately both encouraged and discouraged. They are encouraged by the evidences of the growing commitment in 30 per cent of the schools to at least try some new ideas. More schools are adopting modular scheduling even though it is in a form soon to be replaced by daily smorgasbord and daily computer scheduling or non-scheduling. More schools are building open classrooms, providing large and small group areas, purchasing acoustical flooring, developing huge resource centers, adopting independent study, team teaching, non-grading, teacher aides, and new curriculum materials.

Unfortunately, in most of these schools, in spite of the adoption of some mechanical and curricular changes, Johnny and Mary are not getting a much better education, or at least there is little evidence of it. There really seems to have been little impact at the classroom level. Group-paced instruction is prevalent; students still get D's and F's; we still have the problem of the in-school dropout; the ghetto and rural schools are reminders of failures; the suburban schools, snug in their middle class A and B college oriented values, still are resistant; in examining individual children, individual teachers, and individual classrooms, the findings seem to indicate that in only a small percentage of the situations has there really been a significant improvement. More evidence of better effort is now growing in the affective domain; the cognitive has lagged, but it is changing. We are finding it has occurred in some classrooms. The challenge now is how to draw it all together; the research should be more related to the affective and psychomotor patterns.

Fortunately, the few rooms in America where this exciting improvement has really taken place have provided America with a growing cadre of educators committed to the idea that schools can and must improve or cease to exist. Further, this cadre is learning how to make changes. The task now facing educators is to decide what changes really are an improvement, and then answer how we can best implement them. We must stop experimenting with those innovations of the past ten years, and move ahead to those beckoning in the 70's and 80's. The refinement of the new adoptions of the 60's will come as we interweave them with those of the future.

As stated, one purpose of this book is to bring together the author's experiences in changing schools the past twelve years to show that it can be done. In Spain, Taiwan, and Haiti we had to innovate to survive. The existing conditions were such that one could not run a traditional school. For example, in Haiti we were forced to conduct school for everyone, K-12, from 7:30 a.m. to 12:30 p.m.--a total five hour day. Forty-five minutes of this time had to be instruction in French.

The author's whole concept about the length of the school day and the time needed for each class or subject changed dramatically as a result of forced innovation.

In Arizona we developed one of the first daily flexible schedules in America. It was in successful operation at the time the Stanford schedule was marketed. Students ate doughnuts and had a great deal of freedom. This experience led to a position as full-time consultant for innovation in the University City Schools, a suburb of St. Louis. It was probably the only position in the American public schools at that time with no other responsibility than to help speed up the process of change in the 13 elementary and secondary schools.

The next position in change was the wonderful opportunity to move from a big city suburbia to a neglected rural state. The challenge was there--to see if the same ideas and notions would work in a conservative state beset by financial problems and previously isolated from the mainstream of educational development. There, working in cooperation with the staff of the Lake Region Educational Planning Center, with a tremendous array of national consultant talent, with the local educators in that region, with the State Superintendent of Public Instruction and with the State University at Brookings, contributions were made to the development of new concepts in innovation in South Dakota. It was quickly ascertained that all of the new notions in education were applicable to rural states; only methods of implementation had to be altered.

As this book is written in 1970, we are in the third year of the challenge of helping to change a good conventional college laboratory school, PreK-12, into a good innovative one. It was difficult to give up a full-time consultantship, but some educators must work at the daily nuts and bolts implementation level. Chapter 3, following, attempts to describe one of the many schools now making an effort to reform education. Hopefully, it will help to inspire others to look into the future, to dream a seemingly impossible dream, but then proceed to make it come true. Help is on the way from the colleges, too, as a few are beginning to graduate teachers trained to work in open schools. The need now is for more public schools and universities to begin to operate 1980 programs during the 1970's.

Chapter 3

The Current Effort

The present Wilson program is centered around several key words: humaneness, options, alternatives, relevancy, quality, and evaluation. Goals related to decision making, self-direction, self-image, and responsibility are primary. With freedom goes responsibility, and courtesy is an often coined phrase. Even knowing that a number of the staff will leave, that the school will change again in the near future, and that many of the present programs and ideas will be outdated very soon, the decision was made to include a description of the 1970 directions in this book as a practical illustration that massive, rapid change can occur in a school if the desire is there.

The paragraphs of this chapter are thus designed to describe some of the 69 elements of change which are part of the current edition of Wilson. It is true that this is a school laboratory funded jointly by the state college board, the state department of education, and the local school district, with students ranging in age from 3 to 19 (the old nursery school through seniors) mixed together under one roof, along with a constant influx of both pre-service and in-service teacher education programs. But all of the programs and methods operate on the "average" cost per student for Minnesota districts and have been used in "normal" public and private schools in the United States. The changes made can be accomplished in most school districts; in fact, many of the ideas have been achieved as well or better in a number of schools throughout the nation.

However, in this writing, Wilson has probably gone further than most any other public school in the implementation of daily smorgasbord scheduling, student selection of teachers and counselors, self-selection of curricular experiences, the elimination of all required courses and report cards, optional attendance, student freedom and responsibility, and freedom of choice for "elementary" aged children.

On the other hand, the school has not developed the school in the community concept to the extent of the Parkway type schools, nor has it become as well involved in the lighted community school concept as has been the focus of several districts. What follows then is a summary of what is in actual practice in the fall of 1970. The rationale for these programs and the "recipes" for accomplishing them follow in Sections B and C.

To fully comprehend the present programs, and the impact caused by the rapid, dramatic transition that took place (the same rapid transition is immediately possible in parts of districts, and in schools or parts of schools all over the United States, and will become increasingly true in the early 70's), it is necessary to first back up to July, 1968, just two years and a few months prior to this writing. At that time, Wilson could best be described as a good, conventional school.

It was good in that in general overall student scores were "above average" on the usual national achievement tests; a high percentage of those entering college were successful; the parents as a whole were satisfied with the Wilson program; and there was the same grouping of teachers as one finds in most every school--those who were rated superior, many of whom had developed outstanding programs within

the confines of their four walls, and then the group of weak teachers who did not fit into the then Wilson program and probably should not have been in teaching, or at best in that situation.

Wilson was conventional in that students and teachers had to put up with all the usual but completely unnecessary restrictions and rituals still in effect in the majority of schools today. The elementary children were locked into "self-contaminated" rooms; the secondary school, which was in a separate part of the building, had period 1, 2, 3, 55 minute school-bus type schedules. There were study halls, bells, hall passes, attendance notes from home, and at all levels, the two great tragic evils of the present conventional systems: group-paced instruction and group required courses. The only opportunity to experiment was that which an individual teacher chose to do within the confines of his or her room, or in the 55 minute period, or in some type of back-to-back scheduling arrangements. In other words, it operated as a conventional public neighborhood attendance area school. The teachers received little help from the college, either in pre-service or in-service education because the outmoded teacher education institutions and teacher certification requirements continued to reinforce the traditional approach.

On July 1, 1968, a dramatic revision began which was to drastically alter the above description. The effort was hampered by all the usual restrictions: no money, no consultant help, no planned staff workshops, antiquated facilities and materials, and all the rest. But the new director came committed that ~~McQuate~~ Wilson either had to become one of the most innovative, experimental, exciting schools in the United States, or it had to close. Fortunately, many of the college administrators and the existing Wilson faculty felt the same. A dictatorial decision was made, and that was to attempt massive revision as rapidly as possible. All the staff had in common among the change leadership who supported the director's decision was the commitment that schools had to be significantly better. The first effort was to develop an ongoing program of innovation which would attempt to implement and interrelate all the new, imaginative, exciting concepts in education. From the initial discussions came Wilson's magic list of 69 elements of change, listed in Chapter 22. The following paragraphs describe some of these currently in operation. More detail on how to implement them is given in Section C of this book.

The major emphasis at Wilson in 1970 is in the area of human relations. To implement a humane school, students at Wilson choose their own instructors based upon six "match" factors: personality, perception, age, sex, interest, and skill. Teacher and student images and relationships that really match are still missing in most innovative programs built around team teaching, nongrading, and flexible scheduling, and they are certainly missing in conventional programs where administrators make decisions on required courses, and students are either hand or computer assigned to classes on the basis of even class size and conflict-free time schedules. Positive motivation and self-image, daily success, and self-direction are more important at Wilson than the study of subject matter.

Students also select their own advisor-counselors. The school no longer has the traditional counselor assigned to 300 students. Each consultant (teacher) is being trained to be a counselor-advisor to small groups of 12 to 15 students who select each other on a mutual desire basis.

The adult-student match is the single greatest change made at Wilson and has done more to create a humane school than any of the other 69 changes. The students

and teachers' personalities must match to the extent that they can discuss, argue, hug, kiss, and make up. If this kind of relationship isn't there, positive learning is absent. The same is true for perception. The student must perceive the teacher perceives him or her to be a "great kid"; if the teacher perceives the student as a "dumb little idiot," or if the student has that opinion of the teacher's perception, all is lost. Age makes a difference; some students do great with the "young swinger in the short skirt," but at this moment some need a "grandma." Sex is important too; some students need all female teachers, to some it doesn't matter, but some need all males; some "first grade" students need Dad, yet most all primary schools provide only Moms. Interest as a factor means that the student really excited about butterflies ought to be matched with a butterfly teacher, not one who can't stand boa constrictors, monkeys, and guinea pigs in the room. And, of course, skill is included, for if the student wants to tear apart a motor, it is helpful if the adult available knows something of this topic. How many schools really consider all these educational, humane factors and allow students and teachers to find that mutually beneficial human relationship.

This personal touch in the selection of their teachers and counselors leads to personalized programming. Hopefully each student selects, with help from the adults at school and his or her parents, a program that is relevant to that individual at this moment in time. Students plan their own courses of study; there are no "teacher taught and school required" type of courses. The curricula for each child is developed through individual conferences. Students select their own learning areas, the teacher with whom they can relate, and material appropriate to their interests and needs. Each individual is unique; biochemistry more and more validates the notion of individual needs, interests, abilities, and desires; these former cliches have been written into practically every educational textbook published in this century, but unfortunately, until now have only been cliches and seldom actually have been realities in the schools and classrooms.

As a result of these commitments, there are no required classes, even for the "primary age" children. Attendance is optional; an open campus policy is followed. Students can go home and sleep if nothing relevant is offered that day. To successfully implement all these notions, a policy of window shopping is followed. Students come to school and visit the many centers of study that are available—those traditionally known as art, music, theater arts, mathematics, and eleven others, but which at Wilson have now been merged into five learning teams titled the Creative, Expressive, System, Combination, and Environmental Teams. Students may study in any single area, or in any combination of interdisciplinary or multidisciplinary approaches they find of interest and value. Hopefully the next few years will witness great development of interrelated learning so that the idea of the five teams will be replaced by more meaningful combinations. Wilson has started, with the ultimate goal of having one big interrelated learning center instead of a compartmentalized school of departments and subjects.

In window shopping, the student observes what is being done by others, looks at the materials, and has individual interviews with the consultants (teachers). If the consultant can well suggest a program which seems appropriate, or if the student can suggest and devise his own, or if a combination of student and teacher ideas seem to fit together, the student can start to work immediately. If nothing seems to jell, he can continue to window shop in that center or in any of the other areas. There are no maximum or minimum number of combinations of "courses" a student may take, nor is there a limit on the amount of time

He may take two courses (or "experiences," which is really a better word than "courses" in the Wilson philosophy) in depth, or may be selective in ten. One pursuit may be followed for an exhaustive four weeks, or it may only be scanned for four weeks; it could be investigated for 18, 36, or 66 weeks--the student pursues the inquiry until satisfied or until time and other interests lead him to quest elsewhere. When the school fully develops its 12-month program, there will be no need for formal registration other than an initial one. As students switch courses within a team, the rearrangement is handled through the team. If a student changes teams, then an individual drop-add procedure is provided at the time desired. Thus, the staff always has a "count" on "enrollment."

Student progress is evaluated in terms of learning objectives set through conferences with the instructors, and with the parents whenever they request information or involvement. Hopefully much of the insight into student progress is gained through "dinner table" chats with students at home; but when teacher perspectives are desired, they are readily available by merely requesting a conference or waiting for the written teacher evaluations which are made available several times a year. To be able to respond to the parents, the areas being pursued by the student are recorded by the advisor-counselor and are kept on file in the central student folder. Their studies are readily changeable; students may start or stop courses whenever it seems desirable--whether November or March or August. The curricula is self-developed on a continuous progress, self-paced approach; there are no magic semesters or quarters or report cards and obviously no final exams. And there are certainly no "4th" or "7th" or "10th" grades. Students of many ages work together; the appropriateness of the mix is the criterion, not the number of years spent in school.

Thus a program is individually diagnosed and prescribed by and for each student. These diagnosis/prescription elements take into account student, parent, teacher, counselor, and social inputs. Theoretically, a student may take, and many do pursue, "anything they want." There are no graduation requirements other than just general guidelines (see Chapter 15, Section C) over a 3 to 5 year period; however, these are only guidelines and are tailored to fit individual students. Often in practical operation, the student choice is made and modified through parent influences, teacher and counselor suggestions, and some colleges and employers who demand a union card (transcript showing a diploma with certain courses).

If students follow additional restrictions, it is their choice. They are told of the alternatives; they can gamble on a future job or college based on maturity and other factors; they can go to a junior college or vocational school; they can join the army or get married, or make other personal choices. They are told many colleges no longer care about four years of English, three years of social studies, and two years of foreign language. But they are advised that some still do, and that if they want to be safe, they should take all the "nice" courses. To graduate from Wilson, though, they can major in "basketweaving" if they so desire. Wilson still gets a diploma and does give regular Minnesota diplomas so they are not held up in their future decisions by lack of a piece of paper. Many state colleges have open enrollment policies, so no student is denied the right to attend college, though the choice may sometimes be more limited.

Younger students have the same choice and follow the same program. However, at all levels, if the school really feels the student is making a tragic mistake, the student can be required to take a certain "course." For example, a five year

old usually needs a great deal of motor development. Wilson tries to make the program so attractive that all who need it will choose it; but if a poorly coordinated student does not choose motor development, and if the staff is fairly certain that this is an emergency crisis (the surgeon may make a decision about an unconscious dying patient), the school will step in and operate. At this writing, the staff feels that some, but not all, traditional grade 1 students need a portion of their week structured during the "fall quarter," with a truly balanced group diet for the first few weeks of the "year" to help them learn to make decisions; however, the majority of each week and of the early years, they still have free choice based upon individual considerations. The same could again occur at periodic times during their 14 years in school if students and staff felt this desirable. However, at this moment, all students at Wilson have a completely open program. If the school does ever return to requirements, it will certainly treat all subjects as equally important. For example, never would the staff decide that four years of English must be taken, but no home economics. Because of the importance of child growth and development, home economics for both boys and girls would be one of the first requirements. Thus if requirements were imposed in a traditional high school, perhaps one year of each of twelve areas might be required, but whenever selected by the student as being meaningful and relevant at a particular time of life. At present, though, the optional choice pattern is working quite well, but the above could be recommended for a school wishing to start more slowly, or for one of the school-within-a-school options which are being developed in the better high schools in the nation.

In the elementary years, placing the 6 year olds in the early childhood center as part of the 3-4-5-6 and some 7's program works well. "First grade" students can then have more structure to start but gradually wean out as individual readiness occurs, which might be at any age. Some will still need amounts of structure at age 7 and 8, while others are quite independent at age 4. Each school must decide on its amount of openness for young folk; the basic decision may be generalized for the group, but must be decided specifically on individual needs. The same applies not only to younger students, but to older ones as well. A decision must be made whether to let the traditional non-reader 5th grader avoid reading until he selects it, or require it when the prescribers deem it best.

Most days students attending Wilson select from the daily smorgasbord schedule. It tells what foods are available on the menu for that day--what fruits are in season. Many activities on the smorgasbord are student planned. Because all activities are optional, the daily program for the student is in most cases determined by the individual student. The only reason for a "schedule" at all is to let students know if any special events are being offered, or if any areas are closed, or if a consultant would especially like to see them, or to indicate that a group has been scheduled to meet for some specific purpose. Only about 20 per cent of the activities need to be scheduled--otherwise the menu is really not needed. The schedule is developed daily by four persons; students can help schedule, but usually these are teachers and paraprofessionals who serve about three days a month each on a rotation basis. It normally takes them about one or two hours a day to construct the schedule for 600 students. There is a part-time clerk and a part-time administrative coordinator to handle ongoing schedule problems. The daily schedule and individual biochemistry demand that food service be available all day. The assigned lunch period at a specific time has been replaced by an eat what you want when you want philosophy. Flexible food service is important in an open, personalized school.

Wilson features individualized learning and phase teaching. Once a student has chosen art as part of his personalized program, he individualizes his pursuits within the field of art, or through interrelationships with other fields, such as in a combination of other "subjects" within the Expressive Center. About 85 per cent of the day the student follows his own individually chosen schedule, although this is not rigidly fixed and varies from student to student and day to day. This 85 per cent is only a guideline; during this time the student is often in informal groups formed through individual needs and friendships, but not required or scheduled by the school.

The most important of the five phases of "instruction" at Wilson is the one-to-one tutoring or conference between student and instructor. The curricula for each student is determined this way and is followed by many tutoring and conference sessions. These can be scheduled by the student and teacher whenever both are free and do not appear on the "master" schedule for that day.

The second phase involves open laboratory or open studio. This simply is active involvement by the student in some phase of his study (painting his picture). When this type of opportunity is available, which is usually 95 to 100 per cent of the day, the schedule merely reflects open studio under the "art center" column--the student can go there whenever he desires. Closely related to open lab, but of less active physical involvement is the third phase, that of independent study (an example would be reading or listening to a tape in the Media Center, or reading poetry in the Creative Center). This is usually open to all students in every area most days; occasionally there may be some type of conflict which would close this possibility for some part of the day, but other areas are always open as alternatives.

The fourth phase is small group. Groups still play a role at Wilson but are only scheduled when students or teachers feel a need for them. A small group to discuss the topic of student unrest could meet when background study or interest indicates that such a session might be of value for those who would choose to attend. No groups are automatically scheduled to meet so many times each week at some specific time. The fifth phase, large group, is of the common thread variety and is an example of the specials on the daily schedule. Perhaps a well-known artist is in town and agrees to discuss his art form and demonstrate some general techniques to a group of interested students for a short period of time during the day.

Thus, the daily smorgasbord schedule--a little ham, a little turkey, lots of roast beef, several salads, lots of milk, blueberry pie, and others--are offered each day or on some days for students to select. It is rather embarrassing, by the way, if no one selects the music pie designed by Mrs. Jones. It usually indicates problems, and Mrs. Jones often offers herself right out of a job. Attendance still remains optional; if there are no students, there is no position for Mrs. Jones.

To operate such a program, a great deal of team planning and less but essential amounts of team teaching must occur. Teachers must talk with teachers about kids or the entire program collapses. An attractive physical environment is of value, too. Wilson has carpeted some rooms, has plants and animals in some, and has brightly colored red, purple, green, orange, yellow, and blue walls in many.

Wilson tried to operate on a modified differentiated staffing pattern--doctors, nurses, nurses' aides, technicians, and candy-stripers. The school program is

available on a volunteer 7:30-5:30 plan--consultants and kids come and go as they desire each day; no one is required to spend that amount of time in school, although many do--and not just the athletic teams. Wilson is trying to become a community school, open 24 hours a day, seven days a week. Rigidities found in the state college system prevent this at present, but the school does operate on a twelve month basis now, always open for study except for two weeks of winter vacation, one week of spring vacation, one week of summer vacation, and three weeks of fall vacation. These match college contract periods.

The twelve month idea is one of the most successful. Students are encouraged to attend 170 days during the twelve months for purposes of state aid, but otherwise can come and go as they please. They can take vacation in November or January, or August. There is no reason for students to attend school only from September to June. Some parents can best take their vacations in January if they work in summer trades or tourist areas, or if father is low in seniority on his job, or his "slack" work is in October or February. Some families never get a good vacation together because of traditional schools and their insistence on September to June enrollment. Wilson students have a continuous, self-paced individualized program, so nothing is missed if they are absent; they are encouraged to go duck hunting with Dad, even on a "school day."

The foreign language program at Wilson has great potential. Students are encouraged to take several hours a day of Spanish and/or International Studies. Immersing oneself in the language over a short period of time seems to make sense. As many as possible go to Mexico for six weeks or more each year. Spanish is difficult to learn in Mankato, Minnesota. Plans are now underway for similar programs in other areas of the world.

Students should be outside the school walls as much as possible. Therefore, Wilson students take their psychology class by working three 40-hour weeks at the state mental health hospital; they work in local offices; they take social studies while on vacation trips with their parents; they study by working in local city government offices--all these not for pay but for "experience completion." Wilson hopes to move rapidly with this concept in the direction of the example set by the Parkway School in Philadelphia. A twelve passenger van has been purchased to speed up this process.

The five year olds are in school all day long and self-select on the daily smorgasbord as do the older students, though on a more supervised basis. The three and four year old programs are limited again by lack of state financial support, but Wilson has one-half day programs for each, merely by taking the money out of the former high school allocations. There are no elementary, middle, and high school divisions. Wilson is just one non-graded school. The various learning centers house students traditionally Pre-kindergarten through 12. It is not possible to really intelligently separate so-called "5th graders" from "6th graders" or "9th graders" from "10th graders," so no attempt is made to determine such false distinctions. Various age levels study together in the same facilities at the same time.

Research and evaluation were weak in the first year of operation at Wilson. The second year, plans were implemented to develop extensive horizontal and vertical studies of both short and long range duration. A research person is now on the staff for "inhouse" evaluation. The College Office of Institutional Research has taken charge of "outhouse" evaluation. A research committee for the school has been formed. Graduate students will do their thesis work at Wilson. Studies in

the affective, psychomotor, and cognitive are being undertaken, with emphasis on the first two of these three. Hopefully, by the end of 1970 and each year after that, some significant research and evaluation results will be available as a further contribution to the changing educational scene. Research and evaluation have been extremely weak or non-existent in most school districts in the U.S. Wilson has committed itself to try to correct this flaw; one of the things learned already is that more innovation is needed in evaluation; the "old tools" don't really measure Wilson.

The school administratively operates through a Support Team or "Board of Directors." One person serves as a Resident Consultant and is in charge of the planning center; another individual is Director of Research and Resources; a third person is in charge of the Program Center; a fourth person is responsible for the Person Center (for counseling and relationships); the fifth handles the Administrative Center (budget, scheduling, and facilities). There are three assistants in the areas of media and evaluation. The five "directors" are full-time autonomous persons who make decisions. If a "veto" is ever needed, it is wielded by the Resident Consultant (traditionally the Director). These persons make decisions in their areas, function as a coordinating group for the entire school, liaisons with the learning centers, and work with the various learning teams in small groups. Large group faculty meetings are almost non-existent. The learning teams (Creative, Expressive, System, Communication, Environment) make daily decisions at the student level as related to programs, and students make individual decisions about their studies and group decisions through several types of student organizations. Parent, faculty, and student advisory teams complement the entire design. Parent involvement in the school program is greatly desired. But even more necessary is student input. Students help to make decisions at all levels, not just about Saturday night dances; student involvement is one of the keys to success in changing schools. During the first two years the above administrative structure has been revamped and revised many times as the need arises, and as new programs, development, and better perception become available. For example, at the moment students are finding little need for student committees or councils, for almost all their needs can be taken care of on a one-to-one or small group basis with the consultant, advisor, or administration. The faculty, too, is finding less need for organization as their concerns can be handled in the same manner.

However, one of the reasons for a planning or design team or a board of directors in the school, the delegation of authority, parent and student involvement, faculty decision making, and the desire for parent, student, and faculty advisory teams is the effort at Wilson to create an organization which will provide for continuous innovation, experimentation, research, evaluation, and dissemination each year the school is in existence. Unfortunately, most of the "name" innovative schools of the 60's have leveled off or have reverted. They have stopped too soon--they have not gone far enough. They have not continued to be a leader in change. Some schools must continually go "off the deep edge." As the original "change agents" leave, there must be a mechanism for continuing to develop new programs.

Change is no longer a theory, nor innovation just a "bandwagon" effect. Any educator with a little creativity, 26-hour-a-day efforts, and external support can accomplish the task. The problem has been to find enough leadership--with the proper support--willing to go beyond current programs. When that combination has finally been achieved in a few places, the leadership has usually moved on to "greener pastures" before the project has reached its potential. More money,

better positions, enticing geographical locations, potential future, or just "battle fatigue" have led to the loss of key staff members in almost every innovative school. The replacements have often come lacking the training to step in and continue the ongoing efforts; they have maintained the status quo, but many times have lacked the same "go-power" as possessed by the originators of the project. As a result, education must wait for another "new model" to develop.

Wilson is another one of these efforts; it could plateau or regress as others have if it fails to capitalize on all that is now known about changing schools (much of which is included in this book or in books listed in the bibliography), or if the school is cut back by legislative economy drives, or if the present director or college administrative officials who support the project leave too soon and are replaced by less committed personnel. The early "change agents" have been a restless breed; in many ways this has been good as they have moved and helped spread the notion of better schools; they have sought new challenges; but at present the innovator ranks are thin. To keep the innovation projects under way, we now need "place" change agents (those who stay in one spot for some length of time), as well as "career" change agents (those who move often). Some must continue to move, however, as few in America are yet willing to take on the tremendous task of rapid revision, and unfortunately, the current revisions in most schools are still in the beginning stages or have only been surface or organizational innovations (modular scheduling), so the impact on Pete and Sally has not really been very great in most schools. One of the great needs now is for "change agents" with experience in innovative schools to invade the college of education in order to change teacher education and prepare consultants for Wilson type programs.

Realizing that we now do know something about changing schools, and that many current efforts never materialize, the Support Team type of organization at Wilson has been established in an attempt to make this a long range project, as the current director will eventually leave. If Wilson continues to be successful, and if the legislature does not close or completely revamp the lab school arrangements this year in Minnesota (a strong possibility), more specific details of "how to do it" will be written about the various programs. If Wilson fails to maintain a viable alternative in the future, it still will have made a tremendous contribution to education by achieving fantastic, rapid, immediate success, further proving that many other approaches are possible in education--that different and better schools can be developed.

Most schools have looked for cookbook recipes--they have wanted the "how" before they got the "why." Other schools have discussed the why so long, they never have reached the how stage. Hopefully, the Wilson School is a blend of the why and the how; hopefully, too, Section B and C which follow are the needed blend and of some value to the reader. There is much explanation as to why schools should change, but unless a staff understands the why, all the hows in all the books won't be of any value to that staff. Most schools use the lack of how as an excuse not to involve themselves in massive retooling when failure to comprehend the why, self-satisfaction with the status quo, and lack of commitment usually are the real culprits. The mechanics which are covered in Section C come easy if there is real desire.

In the final analysis, if a staff is truly going to create a significantly different and better humane school, they must take suggestions from consultants and books; they must look at their own strengths, weaknesses, and interests; and they must look at their facilities, materials, and financial resources; and then they must determine their own pattern of change. There are many guidelines, but

there are not foolproof mechanisms available at present to insure successful educational change in any community. Through Wilson type efforts, however, we do know one thing: schools can rapidly and successfully change and become better schools. The Wilson program may fail in the long run, but it currently offers itself as an "idea center." If enough schools attempt new approaches, surely better ways can be found to educate youth.

SECTION B

WHY INNOVATION AND RESEARCH

DEMAND PRIORITY

Envisioning Different Schools

Schools must become more humane than they have been in the past. This means more options and alternatives need to be available. The present schools, through their rules, regulations, and requirements reduce options, thus reducing the alternatives and opportunities for humaneness. The key to improving education is to increase the options; most every public school in the United States needs great revision.

The first step in accomplishing this goal--in any district--is to truly envision an entirely new kind of education. The attitude of the staff must reflect a belief that educators can develop better schools, and that there is a need to do so; with this open ended questing for potential improvements, schools and school districts are free to objectively scrutinize everything they are now doing--asking themselves hard questions in the process. They should be free to dream about utopian accomplishments. Therefore, for purposes of this chapter, it is assumed that there is a need to search for new directions in education. What changes might occur? Why should they be supported? How might these improvements be accomplished?

There are, depending of course upon how one categorizes what constitutes a real change, generally speaking, about 69 revisions presently occurring in schools. One of the most obvious, but certainly not the most important, is that of plant design; the present exterior physical shapes are going to continue to evolve into dramatically different patterns; no longer will the egg crate buildings of the past, or even the new round buildings of the 60's continue to dominate the city and country landscapes. Inwardly the shape will change, too.

Practically no permanent interior walls will be constructed. Any walls will be completely removable air walls or other modular types of immediately rearrangeable walls, but much more important than all the exterior or interior physical change is the new relationship that is closely developing between the teachers and students. The Human Relations School--schools concerned with self-image, personality matches, perception, daily success, relevancy, and positive motivation--are the schools of the 70's. For years we have ignored the research. We have pretended to know the answers. We have said math is more important than music for ALL students. Yet there is no evidence to support such decisions. With conventional group-paced classes, all students have studied the same material at the same time and have taken the same tests; they have been divided into "smarties" and "dummies" by a system called A B C D F--and even worse, in addition, in some institutions, into a caste system variously labeled as ability grouping, levels, gifted, remedial, and tracking.

The new exciting schools envision individual diagnoses and individual prescriptions, heavily weighted with student input. They recognize the mistake of continuing programs and rituals which more often resemble jails than schools. They know now that the individual's self-image, his ability to find some measure of success each day, his perception of the consultant and the consultant's perception of him, his personality and the consultant's personality, the skills, interests, ages, and sex of both parties, and individual styles of learning all have much more to do with the learning process than do group-paced required

classes and irrelevant content or basic skills that supposedly all students must know. We pretend that the basic skills for all students are reading and math and spelling, but for many students, the needed basic skill at this moment in time is one in industrial arts or one that can best be developed through that subject. How many of the achievement tests used by most schools in the United States concern themselves with more than English, mathematics, social studies, and science? There is dramatic need to wipe out the cobwebs which are now ruining education. Schools are in need of a drastic, immediate overhauling; otherwise, many students should not continue to be required to attend. Schools have a negative affect on many--perhaps even on a majority. There are no accurate percentages available, but many educators now believe that the traditional school programs and regulations which still are in effect in most districts in the USA are the major cause of student unrest.

If we took all the schools in North America and put them on a continuum of 1 through 5, as we do the children by an antiquated system called report cards--with 5 being the best schools and 1 being the worst, no school in the country would rate a 5. There is not an excellent school in America today. More schools than we care to admit would rate a 1. A few schools would rate 4. Most schools would rate a 2 or 3. Most schools in the United States are dull and unimaginative. They are not exciting places for boys and girls to spend the majority of the day.

If this opinion is accepted, then what we need now in education are some "vice-presidents for heresy"--people who are really willing to envision different schools. For years educators have been taught to be content, to sit quietly behind the desk, and not "rock the boat." Superintendents have been worried about being fired--they have had to be concerned with keeping the community happy. However, now we are saying that it is time for some administrators and teachers to be willing to get fired, and not just over working conditions and benefits or poor public relations. We want educators more adamant about learning than salaries. How many teacher groups are now refusing to sign contracts over the issue of eliminating report cards? Increased salaries are great, but shouldn't teachers help kids too? We want educators to fight for change in education; for if change means improvement, then change must be accomplished in each community. There are many jobs open in communities all over North America for educators who are willing to be vice-presidents for heresy.

In a specific school now, this task of leadership for change becomes that of the principal. Hopefully, in the future, schools are going to revise their entire administrative setup. The resident consultant may eventually be the key change agent. But currently the way the majority of schools are organized, the administrators can block or promote improvement; most schools today reflect the principal.

If change is going to occur, the principal must literally get the nuts and bolts desk out of his office; in fact, he should give up his office and work instead in the future planning center. He doesn't need the typical kind of administrative environment found in most educational institutions. It is usually easy to identify a dull school just by walking into the main office. Normally the principal is found sitting behind his desk, most always with three straight chairs facing him, so that he can peer over the desk as the voice of authority; some administrators are innovators--they have two or four chairs instead of three. While he attempts a conversation, the phone usually rings; it is Mrs. Jones, upset because her son said there was too much mustard on the hot dog. Then a teacher or secretary interrupts to have a bus requisition or a financial voucher signed; the principal sighs at the stack of letters to answer; it can be assumed that there is no need to visit this school.

But if visitors can't find the principal, if he is out working with a team of teachers regarding learning and instruction, or working with a group of students on accepting responsibility, guests can expect this to be an exciting type of school. The administrators who are convinced of and committed to the idea of change are the administrators who have taken the desk out of their office. They are out working full time as change agents, helping teachers and students accept new ways of learning.

Educators must ask themselves: "Who am I, and how do I fit into this concept of change?" The principal, for example, should see himself as the "idea man," "the change agent," "the vice-president for heresy," "the needler," "the crowbar," "the screwball," "the nut," "the madman," and some things we can't put in this book. These are not cliches--they represent jobs he must tackle and reactions he must expect. He must become a "resident leadership consultant" type person, setting a climate for change; he must be an environmental specialist. Currently in education, some "change agents" are full time school directors--superintendents or principals; some are full time school consultants for innovation; some are state department employees; some are college professors. But whatever the official title, the real purpose is to see that change and innovation and improvement in the learning process occurs. If schools are going to change, creative educators must lead that change. Each educator must soul search his real degree of individual commitment toward helping retool the educational system.

Why is there this tremendous need for change? Is it really necessary? Aren't present American schools good? What about past efforts and past successes? Don't we have in this country doctors, and astronauts, and construction workers, and other kinds of successful people? Isn't it true that we are one of the best educated countries in the world? Aren't schools in the United States now better than they have ever been? Yes, and even though these comments are probably true, and even if they are accepted as evidence of previous success, there are additional factors to consider. For example, recently in one year more money was spent on educational research than the previous ten years combined. We know more about boys and girls than we ever have before.

Experimental schools around the country have proven that though their programs are not necessarily the best, there is more than one way to organize; they have shown we can run schools in a completely different manner than we have these past years, and still be successful in the teacher-learning process, and in fact, usually more successful than in the conventional program. Further, look ahead to the year 2000. When we are objectively honest and think critically about the future, we must accept the realization that almost all that we have been teaching in the past conventional schools--the content oriented courses, and regurgitation on tests on Friday--certainly is not the way to prepare students to be inquiring, discovering, decision making, process oriented learners for the next century.

But before considering all the new and better ideas--before envisioning new kinds of schools--examine some of the striking deficiencies in the present best conventional schools. Look at the way we still teach most subjects. Algebra is a good example. In most secondary schools, even in our flexible modular ones, we still teach algebra for 36 weeks. A traditional course in algebra probably should not even be taught, but if we are going to teach it, why for 36 weeks? The very top mathematic students can learn everything in the traditional algebra book in about 6 weeks. Slower students can do better than they have in the past if they can study algebra for 50 weeks rather than 36; but the present system puts them all into the same classes because they are all going to college. Some schools have

tried alternatives such as tracking and different textbooks. However, regardless of the grouping system, here is what happens to the students once they arrive in class. The teacher walks in and says, "Oh, isn't it wonderful, boys and girls, we're going to spend the next 36 weeks learning algebra together. Yes, each morning from 8:30-9:25, 5 days a week, 55 minutes each day, for 180 days, we are going to have such an exciting time. And realizing it is so exciting, this week go home and work hard on Chapter One because we're going to have a test on Friday." Some schools now allow students to proceed individually through independent study, and the modular system breaks the 55 minute period. But in the great majority of schools, the following illustration is still valid.

Johnny goes home Monday night, looks at Chapter One, learns the material, and is ready for the test on Tuesday; he is the MIT, Cal Tech type math student. But can he take the exam on Tuesday? No, because most schools do not yet have self-paced instructional programs in mathematics. Therefore, Johnny must twiddle his thumbs and waste away the rest of the week waiting for Friday and the exam. But, when it comes, does he get his A? Oh yes, he knew he would, the teacher knew he would, we all knew he would; he got an A in 8th grade, and it is basically the same course except the cover on the textbook is a different color; however, he had to wait a week to get the A. We pat ourselves on the back and say, "Don't we have wonderful schools, and I'm such a good teacher." Johnny got an A; he'll succeed in college; mama and papa can boast over the bridge table that their son received an A.

Mary, another algebra student, comes in on Friday, too; she's worked hard all week: perspired, struggled, burned the midnight oil, tried to get help from dad, fretted and stewed. She finally takes the exam and then worries all weekend; but happily, Monday morning we pass back the paper and sure enough Mary heaves a sigh of relief--she got her B- or C+; she is ready to go on to Chapter Two; she is still eligible for college. But, poor old Pete; he comes in on Friday; you know he's not ready, I know he's not ready, but does he take the exam: Oh yes, because it was scheduled. Then what do we do on Monday? We return the test with his D- or his F, always written in red pencil--not even an innovative color like purple--and say to him: "Pete, you are going to have to work harder and study more and come in after school for extra help; I'll have to send a note home to your parents; you're going to be ineligible for the football team," and all those wonderful things. And then we do another wonderful thing; we say to Pete, "Even though you don't know Chapter One, go ahead and study Chapter Two, because we will have a test on it next Friday." This is repeated in classes all over America in many, many subjects; algebra is but just one small example. Need we wonder why schools must change from the patterns of the 50's and 60's? Fortunately, a minority of schools have now made the algebra illustration invalid. Hopefully, in the 70's the algebra type stories will be eliminated in all schools.

Look at the problem of libraries in the United States. The traditional concept of a library is already obsolete, being replaced by new developments concerned with library resource centers and media complexes. However, the tragedy is that most schools in America are still trying to develop adequate libraries in terms of the old standards. Until recently, only 30 per cent of the elementary schools in America have had a library; practically every one of the junior and senior high school facilities are too small, understaffed, and certainly lacking in materials. As a typical example, look at what had been one of the best school districts in America, traditionally speaking, at least by reputation. Until recently this school district had no elementary school libraries; they had so-called room libraries in each school where, when culling the shelves, 1895 editions of books were found. The junior highs had space about the equivalent

of two classrooms and only a few fiction books and magazines and several outdated encyclopedias. To be specific, the high school library housed only 70 students of an enrollment of 2,000. There were only 10,000 volumes in the center, 5,000 of which were obsolete--Modern Africa Today, 1929 edition. The school district was spending only \$1.70 per student for library books. The American Library Association was recommending \$6.00 per student and now recommends \$8.00 per student. Yet these conditions existed in an "outstanding" school district; fortunately, that district has dramatically changed that situation.

One may ask how the district could be "outstanding" with this library situation. Remember, traditionally speaking, students have been tested and evaluated on the basis of memorizing content found in textbooks and teacher lectures and then regurgitated on national examinations. With enough textbooks, superior I.Q. students, and good traditional teachers, it is no wonder that district scored well on college entrance exams and state content examinations.

As we further envision the need for change in schools, we can now perhaps turn to some of the 69 or more specific revisions. As a starting point, we shall consider first some of the changes taking place in the areas of learning and instruction, followed by a few in the areas of curriculum, organizations, facilities, and evaluations. These illustrations do not apply now to all schools. A very small minority of public and parochial and a few successful new private "free schools" are changing the picture. In the 70's the task of convincing the remaining majority is a priority.

One of the first things the new kind of school is envisioning is that of personalized programming. Requirements in the past have been so rigid that content has been considered before the individual. The program became "the important thing." If Johnny would like to spend two hours in science on a given day and Mary would like to spend two hours in art, it has been practically impossible in most schools because the schedule and requirements call for one hour of math, one hour of history, and one hour of physical education. Many students on some days should spend several hours in a particular subject area, but in the traditional schools the student certainly couldn't miss algebra, and to lengthen the art period would mess up the schedule. When there is a commitment to individual diagnosis and prescription, personalized programs automatically follow; students should be able to spend several hours or all day in one area of interest.

Further, the concept of students selecting their own teachers which was described in Chapter 3 must be part of this humanization of the schools; allowing the student to spend all day in art is of limited value if an "assigned" teacher is one who cannot communicate with the student.

As we personalize programs, there is no need for medium-sized groups of twenty-five or thirty; instead they have been replaced by the five phases of individualized instruction. There is nothing that a teacher does with 25 or 30 that cannot be done as well or better in a different sized group. A few large group presentations are still appropriate in individualized instruction for motivation, information, or exposure not readily available in other forms. These are usually common thread large groups where the topic is of general interest to the group, but not specifically geared to page ten of any book. Large groups related to skills are still appropriate, too, when we remember that LG can be 1, or 300, or any number; if the methodology is LG, it does not matter as to size. One student listening to a teacher-prepared taped lecture is still involved in LG technique. However, we are finding that large groups are seldom used in the far out innovative

schools, and those which are offered are optional in attendance; if they are required, the presentations represent a body of knowledge or motivation felt essential to discuss with the entire group. The proposals of J. Lloyd Trump in the model schools project of a few required common thread large group presentations followed by small group interaction in eight different areas represents this concept.

In small group situations, preferably 5 or 6 students, but seldom more than 10 or 12, sitting around the table or in soft chairs, or on the rug, can do a much better job of discussing and sharing what has been presented in a large group, or what has been learned in independent study or open lab, than they can learn from something we have in the past labeled discussion in a room where a group of twenty-five students have their backs to each other; small group instruction, as well as discussion, is a valuable method, too. Much of the learning should take place in independent study activities, where every student is on a different yet sometimes related study. The fourth phase of instruction in the new kind of school involves individualized open laboratory experiences. The final phase, and probably the most important, is that of the one-to-one student-adult conference.

These revisions in learning strategies are going to be forced by the computer. Computer assisted and computer based instruction, dial access retrieval systems, individualized automated devices, and all kinds of technological innovations are on the market now. They have not been practical for wide scale use, but they will be in the very near future. When we realize that developments that have taken place already in the technological age, we know it won't be long before teachers will be forced into new methods. Fortunately, this is going to be a great asset to education; when consultants must become motivators and listeners and stimulators rather than spoon feeders of information, learning should improve. We must stop the situation where adults talk two-thirds of the time, where students do busy work about 30 per cent of the time, and where only approximately 3 per cent of the time is actually spent in student interaction. When it is realized that often a teacher in a classroom talks more than all the students combined, it is a rather alarming situation.

Learning opportunities call for non-grading, student determined curricular experiences, and flexible grouping. The philosophy of taking the student from where he is and moving him as fast as is desirable, as far as is desirable, will change group learning theories. If little Mary only gets halfway through the present so-called first grade work, that may be just fine. If Janie gets through what was traditionally one year of work, that could be just great. If Sally can cover two years of the old work in one year, wonderful. No longer are we going to stuff Mary into the "second grade" when she isn't ready, or fail her and retain her in the "first grade," neither of which is the right answer. No longer are we going to prevent Sally from moving into the second grade materials because of the problem of what the second grade teacher would then teach. In a continuous progress program, students are going to be able to work as far as they can or as seems desirable.

The philosophy of continuous progress and self-pacing means that present grouping methods are going to change. Homogeneous grouping, heterogeneous grouping, sex grouping, sociogram grouping, and interest grouping are all wrong, if they are done permanently; on the other hand, they are all correct if they are varied flexibly according to the instructional tasks. On a given day, it is quite appropriate to have homogeneous grouping; another day it is more appropriate for

interest grouping or heterogeneous grouping or sex grouping, or sociogram grouping; the team of teachers must draw from a pool of students; teachers and students determine the kind of grouping, if any, that seems appropriate for that particular day on a daily basis. On many days a student or teacher will have no group meetings scheduled.

As we envision these kinds of changes in teaching and learning strategies, we immediately must change the curriculum, for now we can truly individualize learning through continuous progress, self-paced curricula.

The concept of individualizing means that in theory every child will be on a different page in a different book at a different time, or in a different program or activity; each child will be able to pace himself as fast or as slow as needed in the materials he is using in as many different areas as is desirable; when the materials or projects or areas of interest are completed, the student can go right on to the next pursuit without waiting for anyone else. This means traditional final exams must be eliminated. Any school still caught in the trap of giving final exams certainly has not individualized and self-paced instruction. Note the current obsolescence of most universities!

Then take a look at the area of early childhood education. We know that current programs are wrong, yet most schools have not done much about them. A few lighthouse districts are trying; some of the early studies have shown that unless a student develops the verbal, motor, associative, visual, and auditory functions in the early childhood years, that student is not ready for the curriculum we try to put them into when they come to the so-called first grade. Some districts have had as high as 65 per cent of the entering kindergarten children score low on one or more of the diagnostic tests in these areas. The highest percentage of poor performance on some of the individual tests in various districts has been that of motor encoding, and yet motor encoding is probably the one that should be developed before the other four functions can fully bloom. The question is, how many school districts in America today diagnose and prescribe an individualized kindergarten program concerned with these learning functions?

As a specific example, how many districts in America have full-time trained physical educators working with kindergarten children about one-half hour or more every day on individual development patterns? If the school district is paying any attention to the research at all, then it cannot justify the programs that currently are going on in most secondary schools. If money is limited for physical education, it must first be given to the kindergarten. Whatever is left goes to the first grade, then the second, and so on up the ladder. Hopefully, there will be enough money for all children. But if it must be limited, then no school system should have physical education in the secondary school until it has outstanding instructional programs concerned with motor encoding activities at the kindergarten level. And certainly, high school athletic programs would have lower priority than kindergarten; yet how many districts support high school athletics but will not support kindergarten physical education?

In looking at what is happening in packaged education programs in secondary schools, the picture there is rather bleak, too. Many school districts still have courses called Modern World History. The textbook they often use is one dealing with Western Europe only, and the instructor spends an entire year on the history of Western Europe from 1700 to 1900; they never get around to talking about Africa, Asia, Latin America, Middle East, Vietnam, and the population

explosion; these things are not modern world history. Other schools still require every student to read Hamlet, and what is worse, require every student to read it at the same time using the same book; students are on the same page regardless of whether their reading level is sixth grade or sixteenth grade level, and they all take the same test on the same day and are expected to get the same answers. The obvious is the result: some students get A's and some students get F's; and then we claim that one of the objectives in English is to have students appreciate literature. Unfortunately, surprising as it may seem, this type of curriculum is still the approach used in the majority of schools.

We still teach French 55 minutes a day, five days a week, for four years. It is a most ridiculous way to learn a foreign language. We are probably one of the few countries in the world doing it, and yet we defend it because, my goodness, what would happen to the schedule if they had more than 55 minutes a day in French? What would the algebra teacher do if she couldn't see the children every day; and so between the battle of the French teacher perhaps wanting more time and the administrator wanting to give her less time, schools stay locked into five, fifty-five minute periods per week.

As we plan and envision changes, an organization that will allow change to occur is essential. One of the things that must be adopted is a PIE in every school. In other words, a consultant's task is to plan, instruct, and evaluate. The most important things for teachers to accomplish are to plan and evaluate. Right now they spend most of their time in instruction. Further, the teacher should plan and evaluate at school, not at home as still done in most situations. The consultant should be "teaching" or tutoring only ten to twenty hours a week, not twenty-five to thirty. In other words, the teacher's traditional load should be cut in half. And this does not mean doubling the staff; it can be done with a new organization. In completely individualized schools, teachers still often work long hours, even longer than in conventional schools, and especially in the early years of change; but they are in conferences with students, not lecturing or correcting homework. The students use the time preparing for the conferences--the teacher does not take the obsolete lesson plan approach because group classes are no longer taught.

The way most schools are now organized, a teacher has students almost all day; perhaps in the elementary school she has a half-hour off for coffee. Many of these adults are housewives; often the principal keeps them after school for a faculty meeting or some other kind of session; they hurry home at five o'clock remembering that they have nothing in the refrigerator for dinner. One of them stops at the store and grabs some stew meat. This is the first thing in sight, and she remembers there are a few leftover vegetables in the refrigerator. She comes home and gets the stew started; the kids come in: "What are we having for dinner tonight, Mom?" "Stew!" "Oh, I hate stew." They fuss and fume a little bit; then the husband comes home and he is in a hurry and a little bit tense because he has to go back to a meeting that night: "What are we having for dinner tonight?" "Stew!" "Oh, not stew," and they fuss a little. Finally the dishes are done and the cake is baked for the next day, the kids are off to bed, and now supposedly at 9:30 at night the teacher is to sit down and be creative, exciting, and dramatic, and develop a three-ring circus for boys and girls the next day. Well, it doesn't happen. The good teachers do their planning on Sunday; the poor teachers don't do it at all--that's why they are poor teachers. If the good teachers do it at home on Sunday, they are doing it in isolation; they ought to be doing it with other team members. The kind of planning they do at home should be the dreaming and a little individual preparation for student conferences, but

the basic plans and preparations ought to be performed at school, either individually or in conferences with other professional teachers, depending upon the size of the school, the type of team, and the learning being planned.

This means that team planning, team diagnosis of individuals, and team teaching are essential parts in envisioning a new kind of school. Self-contained classrooms are obsolete, as well as departmentalized programs in high school. Some of the worst resisters to change are department chairmen. Teachers should sit around a table, sharing ideas, talents, strengths, and weaknesses. The KEY to teaming is discussion of individual students by teachers who have in common the particular individual being considered. As teachers do this team planning, team diagnosis and prescription, and team teaching, there is going to be increased demand for teacher aides. Paraprofessionals are a tremendous asset in any school. It would be nice if school districts would provide the same number of teachers they now do plus hire teacher aides in addition. The problem is that money probably will not be available for much of this in the near future; therefore, in most school districts, the teacher aides must be provided by rearranging professional loads. For example, for 175 students, instead of hiring one teacher for every twenty-five, or an equivalent of seven teachers, a district should hire five teachers and with the money left over from the other two, hire six aides. This is a one to thirty-five professional ratio, yet it provides eleven adults to work with boys and girls, and a one to sixteen ratio. This is coming closer to the number of hired persons we need in the schools. It provides teachers with paraprofessional help for tasks the teachers themselves do not have time to do or do not have the skill to do, such as typing, audio visual setups, artistic drawings, and other. Teacher aides must be used more than most schools now provide; parent volunteers and golden agers should be involved, too. They are a tremendous asset.

As team teaching and team planning become part of the program, teacher controlled variable scheduling is another must. Daily smorgasbord scheduling allows for time to dream, eliminates the boredom from the school day, provides flexibility, and arranges time for planning. Administrators should not control the schedule nor should the schedule be made up in the spring or summer of the previous year. It is impossible to predict what Johnny needs on a given day, a year in advance. The teachers and students should develop the schedule based on the instructional tasks for that particular day. The best current type of scheduling is daily smorgasbord scheduling. This concept will be discussed in great length in Section C.

Every different and better school must have a heart--and the heart here is that of student freedom and responsibility. If we as educators really believe in developing self-directing, responsible, decision making, value judging, perceptive individuals, then we must give students opportunities to develop these traits. In the present elementary schools where students are with the self-contained teacher most of the day, and where they are supervised constantly during recess and lunch periods, and in the high schools where students are in study halls and have hall passes and bells ringing, and where at both levels the majority of classes are required, it becomes almost impossible to fully implement the concept of student freedom and responsibility.

This concept, along with that of optional attendance, will also be discussed as part of Section C. However, mention here must be made, in terms of envisioning a new kind of school, of the need for optional attendance and self-selection of courses. To class or not to class, that is the question. This is appropriate for

both elementary and high school students. Some schools have experimented with this and had great success. Some have started the other way by giving responsibility cards to those students whom teachers thought were ready, gradually increasing the number over the years. This latter approach has worked well in inner city type schools, especially when interwoven with choice of classes and relevant curricula.

Experiments have involved, for example, suburban "eighth grade" students who several years ago were given two weeks in which they had wide choices: they could sleep all day, or play the piano, eat, talk to their friends, or most anything they wanted to do, but at the end of two weeks they were tested to see if they had learned anything in their assigned classes, because that is what their parents expected to have occur. The teachers who volunteered for the particular project had identified the students; they were not all straight A students, but ones the teachers thought could accept responsibility. These students were given outlines of what was to be covered in each of the classes. During those two weeks, some of the students did not see a teacher of history, for example, during the entire period of time other than to wave "hi" in the hallway. At the end of the two weeks, some of the students came in and scored higher on the teacher-made exam than any of the students who had been in class the entire time listening to all the gems of wisdom and pearls of knowledge the teacher had to pour out.

It makes "teachers" take notice and ask themselves, "What would these excused students have done if they had been in my class listening to me the entire two weeks? They learned everything and more without being in class." As such projects receive further experimentation, it becomes even more apparent that students stay away from teachers who are not reaching the needs of boys and girls. The principal can walk down the hall and see Mrs. Jones and say, "It's nice you're free this hour; I have been wanting to see you." Mrs. Jones says, "No, I'm supposed to have students." The principal then says, "Well, where are they?"

If the desire is to have teachers accept team teaching, optional attendance is one of the fastest ways to get them there. Teachers do not want to take the blame by themselves for students not coming to their class. The studies have indicated that students return to the classes after a couple of weeks; they get tired of eating doughnuts and sleeping on the grass, but they return to those learning areas where the consultants are exciting and concerned about the goals of the learner; they stay away from those subjects where the adults are concerned about content and the goals of the teacher. A number of schools now operate on an optional attendance philosophy; some have experimented with complete self-selection of courses and student-planned experiences for most students, kindergarten through the senior year. It is an exciting concept and works beautifully when fully implemented.

As we envision changes in the area of school facilities, one of the problems mentioned earlier is the complete lack of adequate libraries, or automation centers, or resource centers, or as they are now called, media centers. Looking beyond the traditional school libraries presently housing books, we need to think of a time in the not too distant future of technological advances, of the eventual use of storage banks, to a day when large numbers of books may not even be in media centers. But right now, without technology, schools need an environment for students that is entirely different from the present inadequate so-called libraries which are provided in most schools. Until the past few years it was almost impossible to find an acceptable library in any public school in America. Now with new school construction, availability of non-print materials, and the

acceptance of acoustical flooring and climate control, we are coming closer to satisfactory media centers, though most schools still do not yet have adequate pharmacies nor the physical space.

The media centers ought to be carpeted and air conditioned. There should be soft furniture, couches, chairs, footstools, and reading lamps. When an adult at home decides to read a book for pleasure, usually that person looks for a soft chair, the nicest reading lamp, and the footstool, and really sits back to relax. Young children lie on the floor. What do we do in school? We ask them to sit in the hardest chair, at the hardest table we can find in school, and yet we say, "Enjoy reading!" In addition to a soft reading corner, there ought to be wet carrels and dry carrels. The dry carrels provide independent desks where students are not bothered by constant interruption of other students getting up and down and passing by. The open tables we have in most schools today are fine for student discussions or for girl watching, but certainly are not conducive for independent study. Tables are made for conferences, not for 4 to 6 in independent work. The wet carrels ought to be available so students can plug in electric typewriters, tape recorders, and other presently available tools in preparation for the day which has already arrived in some facilities where dial access retrieval instruction will take over much of the present task of a teacher.

In addition, there must be listening and viewing rooms if these types of functions are not available as independent areas with quiet head sets for listening to tapes and viewing television. Students ought to be able to view and listen and create a variety of materials throughout the school day in the automation or media center. The philosophy of these centers should be that every student has an opportunity every day to go to the media center if the student so desires, but that no student is ever required as an individual or as part of a class to report to the library to be forced to sit there and supposedly study or read or listen to tapes. About 50-70 per cent of the media center ought to be noisy; students discussing materials, watching concept films, and asking questions are crucial to learning. Only part of the media center needs to be for "mousey quiet" activities, but those areas must be available.

In further developing better facilities, there is an exciting new slogan being used as we remodel the current schools and hopefully build new schools of tomorrow; it says, "Knock out the walls and eliminate the halls." The number of walls and halls in school ought to be reduced by about three-fourths or more of the amount now present. Schools ought to be envisioned as a big open barn. In theory, every student would be in this open barn and never need a teacher because after the student received an individual diagnosis and prescription, that student then can go to work on his own to carry out the prescription developed via the consultant-student interaction. On many days in many subjects this theory can be put into practice; large groups of students can work in different environments throughout the school in various independent projects.

Practically speaking, we know that there will still be a demand for various kinds of groups, some large and some small. These groups should be based on the learning interests for that particular day. If a teacher would like a large group presentation, she can request a group. If she identifies four students with common learning difficulties, she can arrange for those students in a group. Or the students can request groups; if several students decide they need help on paragraph construction or want to discuss a particular topic, these students can ask the consultant for a small group. The groupings in the small sessions can be either for instruction or discussion, again based on the tasks at hand. There should always be alternatives available.

Many adults still say this is impossible, that it is merely a theory, that we could not possibly have a big open barn with small conference rooms, independent study areas adjacent, and large resource areas where students could pretty much determine their own program needs each day or where the teacher would individually diagnose each day; but all they must do is imagine themselves in a doctor's office with twenty-four other patients. They expect the doctor to call them in one at a time and diagnose their problem and prescribe the remedy. They also expect the doctor to have alternatives--if the penicillin does not work, they hope the doctor will prescribe sulfa.

The big open barn schools now in existence have generally made two mistakes: They forgot that many have a need for the absolute mousey quiet area at some times during the week, and that at other times need to holler and scream. The big open pods with acoustical flooring and dampened ceilings and "constructive noise" are great for 80-85 per cent of the student's time; but there is still a need for some areas of the barn to be set aside by removable walls for quiet reflection or vibrant kinds of reactions. The other mistake is that they have generally put the same curricular experiences in the barn--they have retained "7th graders" and have said they all must take English, and basically, except for new textbooks or teaming, the course which was taught in the egg crate.

It seems strange that with all the knowledge we have about schools and about learning, that we still prescribe bells ringing as part of the school ritual in a huge majority of the current schools. Hopefully, this statement will become rapidly obsolete. Hundreds of schools around the country have turned off their bells. It's a wonderful environment; it's quieter, students do not run down the halls and race to beat the bell; there are no tardies: no bells, no tardies. An entirely different atmosphere is created as well as one that fits the concept of student freedom and responsibility. People ask, "How does turning off the bells make a better school?" The reply is simple: What research is there to support the notion that ringing bells in a school helps the learning process? Having them off prevents the buzz of a bell interrupting a thought. We do not have enough research on bells and learning to make a clear-cut statement, but if we cannot get bells turned off in schools, how in the world are we going to bring about other kinds of more important changes? The bells are merely symbolic of the difficulty encountered in trying to remove traditions from schools once they are established. Bells have been ringing for no specific purpose for years, and yet we continue to ring them without much of a challenge.

If we are going to implement all of the revisions we have envisioned in this chapter, we must change some of the laws and traditions which apparently are blocking educators. Most states still have a magic date; in some the magic date is September 30. If little Sally is born at 11:59 p.m. on September 30, she is eligible for kindergarten when she turns 5. But poor little Janie isn't born until 12:01 a.m. on October 1st; she is not eligible for kindergarten when she turns 5. Something has happened; the genes have gotten mixed up in that magic minute or two. It is tragic that with all the knowledge and resources and research educators now possess, that we still determine a child's education and possible future by one minute on the clock. How much longer are we going to continue to tolerate standards that are based upon centuries old educational theories which are not validated by any research? How much longer are we as educators going to promote and continue to rely on traditions and rituals based on ignorance and speculation?

If we do all the things discussed in this particular chapter, we are going to have excited students. These excited teachers and students are going to take off on that rocket toward the educational moon.

What has been said in these opening pages is that if we all dream, if we as teachers, students, parents, administrators, college professors, and state department employees all work together, if we finally do ignite the rocket, we really can take the lid off the old educational pot and truly develop a different kind of school as envisioned in this chapter.

Chapter 5

Analyzing Present Practices

If we accept the assumptions, criticisms, and suggestions made in the previous chapter, then it becomes obvious that no school in America is the kind of school we should have--no school in America is the kind of school we could have--no school in America is the kind of school we know how to create.

No school in America has put together all the 69 or more changes, improvements, elements, revisions, and renewals that are now available for schools to adopt--such as those suggested in Chapter 22. There is no one absolute number. Each individual educator and each school staff must compile individual change lists of their own. What revisions is each person or each group willing to accept? Whether they are subdivided as 69, or only 6, or maybe as 106 changes or elements of change, or whether they are not labeled as new or innovative but only renovations of old ideas or practices, is not the important issue. The critical factor is that we must recognize that if we are going to have better schools, each staff must consider the acceptance and implementation of different approaches in education in an effort to truly provide a challenging, relevant environment for boys and girls.

The so-called innovative schools in the United States today are not the kinds of schools we are capable of having because they have adopted only some of the many promising revisions. Not one school in the United States has adopted all the exciting possibilities available to students and educators; schools which are coming close are not yet able to point to successful implementation of all the presently known potential improvements. And the tragedy is that these ideas, as we noted in Section A, are rapidly becoming obsolete as we look at education in the 70's and 80's; thus, the acceptance gap between need and potential, between present and future, becomes even greater.

One of the reasons we do not have an excellent school yet is that educators have been slow to recognize that in changing schools, they cannot make only one or two or five or ten modifications. There has to be massive change if there is going to be significant improvement. The adoption of a few "innovations" is only a step in the right direction. Until we put together all the wonderful new concepts about individuals and learning, we are not going to have the opportunity to truly develop a significantly different kind of a school and thus, hopefully, one that is significantly better.

Neither is it going to be possible to evaluate whether all the proposed changes actually will provide a better education until some school in America puts all the 69 or more practices into operation effectively. When someone finally does, we must then properly evaluate the program to try to determine if it is significantly better and does present one model of the kinds of schools we ought to already have now. With the slow progress in education, by the time we get a school operating effectively with the current notions, it will be time to destroy that program in favor of additional ideas which will be developed in the next few years. Unfortunately, schools throughout the United States will just be in the process of adopting the old "new"; we will again have a time lag in trying to adopt the new developments yet to come and ones that will certainly be even more valuable than those we are trying to implement in the present programs. How many schools now have a planned mechanism for achieving constant change?

One of the reasons that the so-called innovative schools have not been much better than the conventional schools in most cases is that many of the innovative schools have often overlooked, and the conventional schools haven't even started to realize, that in changing a school there must be plans for revolutionary changes in the six basic components of the school: philosophy, instruction, learning, structure, technology, and reporting. Teachers must think of individual students first, not basic skills and content; the affective and psychomotor domains must rival the cognitive. No longer can teachers stand up in front of the class and talk to the students day after day. No longer can they rely on the textbook; no longer can they permit patterns which call for period one, period two, period three schedules in the high school; no longer can teachers be content with the egg crate cracker-box which is so prevalent in most of the school buildings in America; no longer can they insist on the traditional examinations given to the entire class. Schools which are going to improve must change these six interrelated, yet separate components; all six are affected--one cannot be changed without eventually leading to revision of the others.

As innovation in the schools is subjected to analysis and evaluation, there are emerging two basic kinds of changes: those referred to as nuts and bolts or organizational gimmicks, and those related to the individual learning and instruction of each student--sometimes called the essential parts of change. Many of the "innovative" schools have adopted the so-called gimmicks; they have team teaching, independent study, flexible scheduling, new resource centers, doughnuts in the student center, and open pod classrooms. They thought these were going to make their schools much better.

On the other hand, some of the "innovative" schools have adopted what they thought were the essentials. They were not going to fool with the gimmicks. They were going to concern themselves with the real issues related to how children learn. They were going to diagnose and prescribe; they were going to offer individualized instruction. They were going to be concerned with the needs and interests and abilities of students. They were going to be concerned with motivation, self-image, and environment; and they were going to look at each child as an individual. Neither pattern has led to the development of the school for which we are all searching.

What has developed, as schools have begun to change is a realization that both approaches must be pooled in an interrelated effort; in other words, team teaching, resource centers, independent study, flexible scheduling, doughnuts, and others, are essential parts of the new kind of school. But so are the concepts of diagnosis and prescription, need and interests, individualized instruction, and personalized programs; we must put together both the so-called "gimmicks" and the so-called "essentials" if we are going to have self-directing students and a school flexible enough to meet the demands of each individual on a daily basis.

Do all schools need to change? Is all of this innovation hullabaloo really essential? Generally speaking, yes. Usually as one challenges change, the individual comes to the realization that the present schools fail. They lack the capacity to respond to modern day challenges. Most schools in the ghettos are just now learning what to do with the children who come to them each day. Obviously, much of the problem is in the community itself; but until recently, some of these ghetto school districts were using Dick and Jane stories about the farm and grandmother and grandfather. The suburban and rural schools have not done much better.

Schools have failed because they have made the assumption that if a child is failing, it is the fault of the learner; usually just the opposite is the case.

In the majority of the situations, the school has been in error, not the individual. There are always those the school cannot reach; but with a relevant program, tremendous gains have been possible. The previous traditional prescriptions to correct the imperfections which we have admitted and have tried to do something about have had little payoff. We have had discouraging results from compensatory education. For example, we are just beginning to solve the problem of remedial reading classes.

There has been an inability of the sub-systems to overcome various problems. The model schools have not developed programs that could be adopted nationwide as part of the answer to improving education. Schools that have become involved in total reorganization and have developed different kinds of programs still have yet to show convincing evidence that the rest of the schools ought to move in that direction.

One of the reasons why we haven't done a better job is that we have failed to recognize a philosophy of alternative educational programs. At this writing, we do not know what really is the best kind of school, if there is, or ever will be, a "best kind"; and yet most educators will not admit this. We pretend that "our" school is the best, or at least is good, or that we have the answers. Or even if we admit that we have some problems, we state that overall, "We have a good school; we are working to try to correct the deficiencies." Thus we have argued as to whether we should keep the conventional classroom or move to some completely upside down kind of school. Both schools of thought are wrong, based upon current knowledge.

There is absolutely no proof or evidence of any kind that the conventional school as we know it today--the self-contained classroom, the single textbook, group-paced instruction, report cards, bells, room libraries, and all the rest of these kinds of practices are the best way to run a school. On the other hand, we have no evidence yet that adopting all of the proposed changes, including team teaching, flexible scheduling, non-graded programs and new curriculum materials, the concept of student freedom and individualized instruction, and all the other 64, make the school that much better. We do have some dissatisfactions; we do have some evidence that for most students the conventional practices need to be changed, and we do have some evidence that some of the practices in the new types of schools offer great potential for the future.

The author certainly agrees with John Gardner's statement in his book, No Easy Victories, "I am entirely certain that twenty years from now we will look back at education as it is practiced in most schools today and wonder that we could have tolerated anything so primitive----in the end it is love of learning, curiosity, self-discipline, and the capacity to think clearly----the quality of the teacher is the key to good education." However, the teacher needs humane alternatives if he or she is to be a humane teacher; therefore, though present evidence in many areas of education is inconclusive, there are some statements that can be made with fairly accurate prediction.

For example, based upon current research, in every community, students and parents and teachers ought to have a choice as to the kind of program in which they desire to participate. Probably there ought to be a few schools or rooms, depending upon the size of the school district, which are still somewhat self-contained, with report cards, and fairly conventional programs, because some students, teachers, and parents still seem to operate more effectively in that environment now.

There ought to be schools or rooms in each community that operate as a mixed program. Part of the school should be upside down and part of it should be

conventional. In other words, perhaps this school might have some team planning, self-pacing, and new resource centers, but still have some vestiges of the old in terms of textbooks, recesses, a traditional schedule or whatever.

But in every community, there should be at least one school for parents, teachers, and students who want an upside down kind of situation to have a guarantee that from Pre-kindergarten through 12 a person could be in a learning situation where he or she could be involved with all of the changes and innovations in education. Few of the school districts or colleges in America have provided this kind of alternative. They have forced all of the students, teachers, and parents to be involved with either a semi-flexible school, because no school is completely flexible yet, or they have forced them to stay in a self-contained room or conventional school. There should even be public "Summerhills," especially in the larger districts.

One false notion that districts have followed is that before they change, they must have close to 100%, or at least a strong majority, in support. This is far from the truth. They should not wait for 100% of the community to agree on the kind of school they ought to have because they will never agree to the tune of 100%. They should not even wait for the majority, for if they leave the schools conventional, those who believe in an upside down school have to send their kids to a conventional program; teachers have to consult in an environment in which they do not wholeheartedly support. On the other hand, if all the teachers and all the parents are forced into the upside down kind of school, they don't do a good job; they fight it because they do not believe in the kind of educational program being offered.

Therefore, until we have further evidence or further proof as to what is the best kind of school, we have to be experimental; every community in the United States has an obligation to offer parents, children, and educators a choice while we are attempting to find solutions. In every district there should be, for example, at least one conventional school, one semi-flexible school, and one very open school.

If there is trouble in selling this kind of philosophy in the community, ask the opponents, "Don't you believe in motherhood and apple pie and patriotism?" The American dream calls for choices; we should not be forced to accept only one way. We should not be forced to accept monopolies, and yet in most communities, the schools are examples of some of the most horrendous monopolies ever developed in the United States. There are school districts in America with six elementary schools, and all six are basically replicas. They use the same textbooks, materials, and supervisors; they have the same general philosophy; teachers are hired to operate within the confines which have been set up as the district elementary school philosophy. If a new parent moves into that community, and that parent does not accept the kind of school that is replicated six times, that is too bad. They have no choice but to send their kids to a school in which they do not believe; if they refuse, they must fight the power of a "police state" situation; they must go to court and face a battle to try to say, "I do not want my children in those kinds of schools, and I am not going to send them there." In almost every case the parent loses; they must pay a fine and lawyer fees; and the students are still dragged off and forced to go to a monopolistic school, attendance at which is even determined by the side of the street on which a home is purchased.

Now, with dreams and visions of better schools, and with freedom and democracy and tolerance and justice and understanding and apple pie and motherhood and all

these things in which we believe, can we say to teachers and parents, "You must send your child to that school; you must teach in that kind of school; you must participate in that kind of program, even though you do not believe in it; if you don't, as a parent you can go to jail; as a teacher you can lose your position." Related to the chapter title Analyzing Present Practices, do we really want to retain the group prescription system?

It is true decisions must be made and that children need an education; but is there anything wrong with offering choices, especially when we must admit that currently we do not know what constitutes the best kind of school for all boys and girls. If we give parents and teachers choices and allow them to operate within wide extremes of philosophies and beliefs, we can come very close to providing the kinds of educational programs for boys and girls in America which seem to be best suited for that particular student, teacher, and parent at that particular moment in time. Perhaps one day we will know what makes a successful school and a successful teacher, but we do not know now; we only have a few facts and a number of guidelines. We must analyze the kinds of schools we have, and we must search for significantly better schools. In the meantime, a basic key in changing schools in any community is to provide OPTIONS for students, parents, and teachers. Any district can change if there is no attempt to force everyone to accept and participate in the new program. Report cards, for example, are easily eliminated for the majority if parents are given an option; those who want them receive them, while those who do not are able to escape A, B, C, D, F evaluations.

One of the reasons that educators have tried to develop the middle school in the United States is that of dissatisfaction; we have challenged the success of the junior high. We have said that current grades 7, 8, and 9 as now constituted in most districts in America--the curriculums, programs, philosophies, regulations, which we find in most junior highs--have failed to produce the program we first envisioned when the junior high was basically developed; it was an innovation at one time, but it is no longer the school we ought to have for boys and girls ages 11 through 15.

Is the middle school a much better answer? Is the 4-4-4 plan better than the 6-3-3, or is an educational park, Pre-K through 12, better, or 6 through 9, or 5 through 8; what is the magic answer? Obviously, we do not know for sure what is the best organizational pattern in a school, though evidence now points to a 9-12 high school if separate plants are constructed, but philosophically and preferably calls for a Pre-K through 12 park; but one thing we do know is that the present junior high must be changed. The exciting thing about the middle school is not that it has grades 5 or 6 through 8, or ages 10 through 14, if the school district has eliminated grades as they should; the exciting thing about the middle school is that it presents an opportunity to start all over again. We can say, "If the current 5th, 6th, 7th, 8th grade programs are not appropriate for boys and girls ages 10 through 14, then what kinds of programs are?" In other words, with all the knowledge and resources and research and money and talents and time we now have, here is a fantastic opportunity to forget all the traditions and all the past ways of doing things and develop what could be the most exciting school years in American Education. Yet most middle schools across the country are continuing to adopt many of the practices which were unsuccessful in the junior high merely because of tradition and because they are afraid to move too far along in the change process.

We must challenge the concept of junior high; we must also analyze the reasons middle schools have started in some communities. Many have adopted a middle

school because they built a new high school to house 9 through 12. They merely moved the self-contained 5th and/or 6th grades into the building and left 7th and 8th programs basically the same. But whether it is called a middle school or a junior high, the important thing is what is happening to boys and girls in that setting. How can the middle school be better than the junior high if both programs still have a "7th grade" and in that grade require English, history, math, science, physical education, and one semester of art and one semester of music? Usually the old junior high and the new middle school in the same district are teaching English courses based on a similar district curriculum guide. And how much longer can we tolerate communities building new high schools and dumping the junior high students in the old high school building.

Why don't the new organizations include pre-kindergarten; certainly there appears to be value in 3 and 4 year old programs. And what about junior colleges? Should not the new organizations include nursery through 14, not just kindergarten through 12? Preferably, schools should not be divided into elementary, middle, and high schools. How does one decide to cut off the 5th grade from the 6th grade, or the 8th from the 9th. A number of exciting programs are now developing in pre-kindergarten through 12 parks, where all the students are housed under one roof and are inter-mixed in halls, student centers, social activities, and study centers. Any divisions are determined by individuals, their interests, and their personal development, not by arbitrary division imposed by administrators and school boards. Directors of such Pre-K through 12 complexes find the non-graded, continuous concept so exciting that it would be difficult to return to any other kind of structure. However, if schools are already built in arbitrary divisions, as most are, the school then has the responsibility to provide a continuous program for all enrolled. This means that the present 7, 8, 9 junior highs must provide for students individually working at levels ranging from the old grade 3 through grade 16. In conventional buildings and districts, by devising overlapping "grade level" teams, such as K-4 and 3-6, or by overlapping schools within a district, individual needs can be better met.

Money can be made available if the public is convinced. Schools should be community centers, open 12 months a year, 7 days a week; but adopting new organizational patterns, such as twelve-month schools where students need to attend only the current total time, does not necessarily lead to better educational programs. Again, the need to analyze current practices and the concept of change in American education.

Why are change agents insistent about this challenge? One reason stems from visiting numbers of buildings around the country that are called "innovative schools!" As one example of what the visitor discovers, "innovative" middle schools are often still giving A, B, C, report cards; there is no reason for report cards in grades K through 8. Most of the present middle schools are really no better than the junior highs one can visit throughout the country. As a true illustration of the problem, in one middle school the author took a piece of paper from the trash can in order to write some notes. It looked clean, at least on one side; but in turning it over, there was discovered a big red "D" at the top of the paper. It wasn't even in green or blue or black or gold or some other perhaps more "innovative" color: it had to be red; the paper was entitled Experiment 2, and signed with the name Wally at the top. It was neatly written, although the margins were not exactly correct.

Wally had written, "What we wanted to know; we wanted to know if the second bulb goes off if you shut off the first bulb." The teacher had written an exciting

note again in red ink: "What kind of an electric system is this?" A very exciting kind of question for Wally. Wally continued, "What we did: we took two bulbs and connected them to a dry cell battery and shut off"; and here the teacher had to interject with a "how" and a question mark in red pencil--another intelligent question by the teacher; Wally continued, "the first bulb and found out that the second bulb turned off to"; and the teacher again used her talents and her time and her efforts to make an exciting kind of observation on Wally's paper; Wally had spelled too, "to," so she neatly added in another red "o" and a period. Wally continued his next and final paragraph: "What we found out; we found out that if you turn off the first bulb, the second bulb will go off, to." Here the teacher had tired; she had failed to add the other "o" to "to." But at the bottom the teacher had written a big red "why" with a question mark: and at the top of the paper, she had given him a nice fat red "D."

Now, why in the world would a school continue to give Wally a "D"; he was an 8th grader traditionally. There was no need for a report card; there was no need to give him a "D"; there was no need to write those wonderful comments in red ink; it was a waste of the teacher's time and a waste of Wally's time. He neatly dumped it in the wastebasket as most Wallys do, and all this succeeded in accomplishing was to further Wally's negative self-image and confirm that he was not successful in his school ventures.

The principal of that school was asked about Wally; what had he accomplished last year in the conventional program? The answer is what you would expect; Wally was not successful; he was a discipline problem, got poor grades, and wasn't excited about school. The principal was then asked what happened to Wally this year now that the program has flexible scheduling, team teaching, non-gradedness, a new middle school concept, and supposedly individualized instruction. The principal's sad comment was that, unfortunately, nothing different had happened to Wally; he was still pretty much the same kind of student that he was in the conventional program last year. In other words, all the changes, all the gimmicks, and all the time and effort that had gone into supposedly making this a better school still found Wally failing to find success in his everyday experiences.

One of the reasons why Wally has not found more success is that we have not really become professional in education. We are still involved in group diagnosis rather than individual diagnosis. Turn for a moment to a doctor's office and pretend that 25 patients are sitting in the waiting room, each with supposedly individual ills--a broken arm, appendicitis, pneumonia, or whatever it might be. Dr. Jones walks out into the waiting room and says, "M, it is nice to see all of you here today; oh, but some of you seem to be frowning; some of you even look sick; well, don't worry, we can take care of the problem; it's obvious as I look over the group of 25 sitting here in the waiting room that you all have a common ailment--you have the flu. That is solved quite easily; all of you line up for flu shots; at the end of three days come back and we will evaluate you to see whether or not the shots have cured your flu." How long would we tolerate M.D.'s operating this way in the community? We would run them out in about five seconds; we expect individual diagnosis and treatment, especially when even though we all have a health related need, we do not all have the flu, but instead one has a broken arm, another an earache, another appendicitis, and still another a headache.

Now shift gears back to a different waiting room, one of the "my rooms" of the high school. The teacher walks in and looks at the students and says, "Oh, isn't this going to be wonderful year. We are all going to sit here for 180 days, 55

minutes per period, for 36 weeks this year; we are going to have an exciting time, the twenty-five of us working together. What! I can see some of you are frowning; I'm sorry; let me see what is wrong. This is 10th grade English. Let me dust off the curriculum guide (which was usually written several years ago and should have been burned before being printed). Oh, I see your problem--don't despair, I can help; it says 10th grade students lack an appreciation of literature. We can solve that problem; all of you open your books to page 22. Yes, the green book, page 22; yes, that is the story, Silas Marner. Now we are going to read Silas Marner for the next three weeks and discuss it in class; then we will have a test. After you have studied Silas Marner and had your test, all of you will be cured from this problem called lack of appreciation of literature." "What! You failed Silas Marner--don't give up--in our school we always give you a second chance; open your blue books this time to page 1. Yes, that is it; we are all going to read together that great piece of literature called Julius Caesar. Do not worry that some of you are reading at 7th grade level, and some of you are reading at 13th grade level. You are all in the 10th grade so you should all study the same textbook, read the same story at the same time, have the same exam, even though some of you cannot understand it, and some of you may be bored because you read it by yourself two years ago. What! You failed Julius Caesar--well, do not despair. In America we believe in trilogies; you always get three chances--three strikes before you are out. Open your brown books this time; yes, that is it--Tale of Two Cities."

Some schools have gotten innovative and have substituted Treasure Island for Tale of Two Cities, and some are really innovative and are now in trouble with the P.T.A. because they substituted Lord of the Flies for Treasure Island. "What! You failed Tale of Two Cities. Don't quit yet; we have another wonderful opportunity in store for you. Because you failed to appreciate literature this year and thus failed English, you get to repeat 10th grade English next year and read the same three pieces of literature again." Conventional educators say that this is an exaggeration, but all one has to do is visit 10th grade required English classes all over America. If it isn't Silas Marner, it is still some other group-paced requirement; schools which have ability tracks or some type of "homogeneous grouping" only make the matter worse. The "new" quarter system in English is certainly better than the year long course, but the quarter classes are still usually taught with group requirements and group prescriptions. How much longer are we going to continue to tolerate this kind of diagnosis in education?

What we are talking about is the fact that we need to individually diagnose and prescribe for each child; we need to offer alternatives in terms of programs for each child based upon individual needs. The doctor checks each patient individually; he often calls for help from another specialist. He calls for help from his aides, such as nurses and X-ray technicians, and for blood tests in the laboratory. In other words, he not only individually diagnoses and prescribes and uses his own judgment, but he uses the judgment of other professional doctors and nurses and the results from laboratory and X-ray techniques. Yet, where are we as educators? We are still determining the patient's prescription before we ever see them, before they ever enter 10th grade. We say that all 10th graders next year certainly need to read Silas Marner, because the curriculum guide says they need to appreciate literature; therefore, order a book for each child so that they may read and discuss it as a group, for they all have the same deficiency. We never do individually diagnose and prescribe for Sally and Henry or ask whether or not Silas Marner is the appropriate tool for each individual.

Wouldn't it be a sad state of affairs if M.D.'s planned that next September the first twenty-five patients to come into their offices would be classified as those

who have appendicitis problems, and all twenty-five would receive the same operation? Yet, in schools we decide in the spring that all incoming 10th graders need the same curriculum in the fall; and the tragedy of all this is that we haven't even met the transfer students. However, it does not matter; we already have a book for them.

If we get involved with psychodiagnostic evaluation of some of the problem learners, which we must do more of than we have in the past, we find that students have problems in the cognitive, affective, and psychomotor domains. Most of the problem learners, ironically, have difficulties in the affective or psychomotor areas; they need a personalized program; they need to improve their self-image, find success, change their concept of life; they need a little love and affection; they need a teacher who perceives and who understands psychological influences on learning. They usually have failed to receive the proper perceptual motor training in the early years.

But what do we do in most of the schools with problem learners? We put them back into more cognitive structure and give them more requirements; we say if Johnny cannot read or if Johnny does not like math or does not do well in those subjects, then the answer is to give him more math and more reading and more requirements, even to the extent of taking away psychomotor or affective domain development areas. We take away some of the so-called frill subjects like art, music, and physical education so that he can spend more time with reading and mathematics; and we take away sports and other curricular activities of this nature through ridiculous eligibility rules. This just merely increases the problem of the child in most cases.

In analyzing current practices, as this chapter attempts to do, we find that we induce negative self-image for many students, and perpetuate it for others. What a number of them need is empathy and sympathy from the consultant; adult perception must be different. Some students may need two hours of individualized reading, two hours of art, an hour of physical education, and an hour of responsibility time at a given moment in his or her development. But do we allow that? No, because the magic requirements and schedules arbitrarily set by administrators will not permit this kind of personalizing.

Take a look at the tragedy of some of the Indian students. Many of them score below "normal" on a verbal test but score above average on a non-verbal test. Many of the Indian students come from families with incomes below \$2,000. We classify them as stupid and lazy. We talk about the problem of alcoholism among the American Indians, but what do we do about it? Do we give the Indian classes in Indian aesthetics? Do we point out the beauty of their ceremonials, crafts, art, poetry, and dances? Do we enhance the wonderful culture and heritage from which they have come? Do we point out in Indian history classes that Custer probably deserved what he got? We talk about glorious cavalry victories but Indian massacres. Do we talk about current Indian affairs and problems in classes? Usually not; rather, we attempt to make the Indian child submit to the culture of middle-class white suburbia; and as a result, many of the Indian students suffer from negative self-image. These same descriptions apply to other problem learners and to other minority populations as well as to a number of Indian students.

This is not to say that all Indian or minority students have these problems. Most are fine individuals, and many of them do an excellent job in school; but as we work with the ones who have problems, we are really forced to ask, "What

are we doing to correct the errors we make in most of the schools in America today?" We are not doing what we should with any of the minority groups who are having difficulty; the same statement applies to most of the problem students, from a minority or not. We do not have the answers; and yet, by pretending we do, or conveniently excusing the situation by a lack of time or a lack of money, we continue to perpetuate the difficulties of the problem learners. Do we really have "problem learners," or rather do we have "problem schools"?

If we would only listen to kids. The students will indicate what is wrong with the schools, and they will indicate what kinds of programs we need. The schools that have begun to do this have had rewarding experiences. Some Indian philosophies, for example, say, "If you do not understand my silences, you will never understand my words." Why do some students remain quiet in the classrooms? Could it be that they have a fear of being laughed at, or that they do not want to answer after another has failed and perhaps embarrass that other student? Could it be that they are afraid of being too right or too wrong in some situations? Some cultures teach the child to be quiet and listen; some are taught not to shine to the extent that others will criticize them as being too goody-goody. What some of these students with problems need is an adult to talk to; we arbitrarily assign teachers and say to the student, "Go here, go there." If the student and teacher do not get along, it is usually the student's fault. Have we gotten to a point where students can select a consultant who allows students the opportunities to talk about themselves and the things they know best? Do we really show a genuine interest in each individual student, or do we pretend that we do and then put them into the mill of standard requirements and group procedures and group diagnosis every day at school?

We talk about culturally deprived students. There are none, but there are some who may be culturally different. If some tribes of Indian students playing basketball are asked what the score is, the questioner might ask all afternoon and never find out because they do not care. Yet, watch some groups of middle-class Caucasian boys from suburbia; every five minutes they are arguing about the score. Even in a game of scrub pickup in a local neighborhood, competition becomes more important than cooperation.

These types of differences can certainly cause cultural barriers--a real lack of communication. If we are to truly understand individuals, we must finally admit that many students in classrooms may certainly need different programs. In one of the big cities recently the topic of a speech was the problem of students being culturally deprived; and, of course, again the answer was that they are not culturally deprived, but that they may be culturally different. It was pointed out that if a stranger went down to X Street and Y Avenue in this city on Saturday at midnight, the stranger would be the one to be culturally deprived, or at least the one who was culturally different. If the stranger could not understand the culture in that community, he might be in serious trouble at that particular time of night and on that particular corner.

When we challenge the need to change some of the practices which have been discussed in this chapter, we must remember that we are not just talking about the need to individualize programs for all children--tall, short, fat, thin, pink, green, fast, slow,--it makes no difference as to their background, other than recognition of the fact that usually the individual's frame of reference and self-image make mandatory individual prescriptions.

Further, we are talking about all schools--suburbia, rural, and inner city. We must analyze schools and their programs in all settings. Schools cannot continue to have confining acres or fences. Students can no longer continue to enter at

8:30 and be gobbled up in the walls of the school and not leave until 3:30. Schools cannot close at 3:30 or 4:00. They must be open seven days a week, 24 hours a day in most communities; students, in addition to using the school, must use other community resources, and the parents must utilize the schools. Some schools are beginning to contract out to private agencies for instruction. They might, for example, contract out with a local reading laboratory a certain amount of time in which this laboratory works with designated students who are having reading difficulties. Often in these cases the private agency may do a better job than the school because the agencies are geared to handle this problem; their existence depends upon the volume of clients and their ability to succeed with these problems. Their only profits come from this kind of instruction; if they are not successful, they will soon be out of business. Such agencies might be used to tackle some of the immediate problems in education. The recent O.E.O. effort in this direction is a pilot program to sample the cognitive reading and math areas; improvement could relate to the affective. In spite of the early flaws, with the unfortunate interpretation of accountability, and the financial hassles, this concept may be of value in the long run.

The potential school community resources are generally yet to be tapped. Why is it that we always seem to teach art and animal classes at school? Can't the animal classes be held at the local zoo? Can't the art classes be held at the art museum at least part of the time? These are not original ideas; some communities and outstanding leaders in education have long advocated and have already implemented these kinds of programs. In this chapter we are just trying to draw together some of the current practices, an analysis of which does challenge present notions about schools.

Why, for example, can't students from school A and school B meet at the zoo to learn together. We have the problem of racial imbalance in certain cities. Part of the difficulty as related to schools is that we insist on the neighborhood school and the fact the students must spend all day within the school walls. Why couldn't 30 students from neighborhood A which is perhaps an all "white" neighborhood and 30 students from neighborhood B which is perhaps an all "minority population" be sent to the zoo together? Here they form a class of 60 with two teachers and perhaps the employee at the zoo, parent volunteers, and teacher aides. In other words, perhaps four or five adults can work as a team with these 60 students to teach them something about the particular animals that they are visiting at the zoo on that particular day. Here is an integrated class working together outside the school walls; it helps to lessen social problems and the school racial situation. Both groups are bussed; it is probably a much better learning experience to have students study animals in the zoo with all kinds of resources available than to have them sit in a classroom reading a book, looking at pictures, and perhaps discussing with a teacher who knows very little about animals.

Why can't students spend a week or a month or longer working at the local hospital or all the dozens of other places in the community? Obviously, not all communities have zoos, art museums, or hospitals; and the weather, size of town, and number of students place limits on the practical application of these ideas. However, some of it can be done in each school district. The important concept presented here is that of getting the students outside the school walls more often than the half day field trip once a semester.

Consider the classes held within the walls, especially in the light of the twenty-first century. Is the content that students are learning really important and relevant, especially if the medical scientists are correct in their predictions

that some of the current seniors will live to be 100 years old, and that some of the current kindergarten children may live to be 125 years old. Many of these kindergarten children will not go to work formally until age 25, will work only a three or four day week and will retire at age 50. Are the kinds of programs that we have in the schools today designed for students who are going to live in the world of tomorrow? We no longer can say, "Well, that is way off in the future; we will worry about the twenty-first century when we get there." These students who will live in the twenty-first century are already in school and their programs must begin to be geared for a different society.

Suppose the current kindergarten children do not learn anything until they are 30 years old. They still have 70 to 100 years in which they can learn all that we learned in the 70 years we had when we came upon this earth. What are these students going to do from age 50 to age 125? They will have 75 years of leisure time to twiddle their thumbs because we have not provided opportunities for them to do anything different. What are they going to do on the non-work days of the three or four day work week? This is one of the tremendous questions and one of the tremendous challenges in this world of change. What is really important to learn now, for the future, and for students currently in school who may be alive in the year 2050?

Many of the leading educators are saying that perhaps the expressive subjects--art, music, dramatics, creative writing, foreign language as a recreation, recreation courses themselves, home economics, and industrial arts--are really the important subjects for many students. In schools are we going to continue to deal primarily with the instrumental subjects of math, science, social studies, English, and foreign language taught as an academic exercise? Even now, most of the population is working only 35 hours a week; yet, about 15 per cent of the population is averaging 55 hours a week. It's an unusual situation when a few put in 55 hours a week so that the many may work 35 hours a week. There has been a tremendous change from the years when the so-called blue-collar workers worked long, long hours so the few white-collar workers could enjoy more of the luxuries and time off. Many of the things we are now teaching in math, science, and English are not of value to current students, nor will the content be of value in the near future. Perhaps art, music, dramatics, and the expressive kinds of subjects will be the most important that we can offer to a great number of students. Certainly many of the students need more than we offer in these areas in current schools; we cannot really justify the old "academic" requirements for all students for college admission or high school diplomas. In those areas which we might decide to require, certainly the process rather than the content must be the focal point.

Many educators can dwell upon their own personal experiences such as attending a self-contained elementary school where they never were fortunate enough to have really outstanding teachers in the areas of art or music. Many, as students, were not too interested in those subjects anyway and, therefore, never developed much skill or talent. They finally got to the 7th grade where it is common to find weaker teachers in required 7th grade art and music. They disliked the teachers and the courses, so they rebelled and received D's in both courses. Their experiences in art and music in the 7th grade were so horrible that never again did they choose to take an art or music class. They often go through five more years of secondary school, grades 8 through 12, four years of undergraduate college, and four more years for the Ph.D.--thirteen years of high school and college work--and never once do they take an art or music course. Why? Because society said these things were not important. They were required

to take over and over again English, history, and Mickey Mouse education courses. The strict required curriculum and traditional methods of teaching really have proven to be of very little value to many; and yet, never were they required to take anything in the area of the expressive subjects, except for a little physical education which was poorly taught. In high school most were even excused from that because they were members of the athletic teams; and now these students are school administrators and parents.

If one wants to see weak education, generally speaking, visit 7th and 8th grade required general music classes. The 7th and 8th grades are supposed to be exploratory and elective and exciting; and yet we require students to take English, social, math, science, physical education, and/or art/music, and/or shop/home economics. If they do not do exactly as the teacher says, they flunk and are told that they are terrible students. In art and music, for example, even though they were designed supposedly to help students find a place for themselves as they explore their future, if some students do not like a teacher, do not like working with clay, or cannot sing in tune, they get D's or F's or unsatisfactory notices in these exciting exploratory years of their lives. And what research indicates that all students should have two semesters of English and only one semester of music?

What really is important to teach in terms of current knowledge? If the eight-year study during the 1930's had any value and if the experiences we had with the GI's returning from the battlefield in 1946 and entering college had any significance whatsoever, then we certainly should know that college success does not depend upon the magic requirements of most high schools. It is possible for a student to skip those wonderful algebra, English, biology, and world civilization courses and still go on to college to become doctors, lawyers, astronauts, construction workers, salesmen, or whatever other criteria we want to apply as having found success in the academic world. And how awful that word "academic" is as used in schools. We differentiate between the so-called important academic subjects and the so-called less important subjects--"the frills and the non-academics." We know that students can take four years of basketweaving in high school and still go on to college, find success, and get good grades, if grades are the criterion. The important thing is that the students find success, develop positive self-images, find that learning is fun, learn how to tackle situations, become self-directing and responsible, and learn to make decisions and value judgments. These are the kinds of things that seem to make a difference in terms of success, not only in college but in the world of work and the world of home. Therefore, what should we teach, and how should we teach it? What evidence do we really have to support that what we are doing now is the correct way?

And look at the so-called curriculum innovations. Most of them have been improvements over the past; the materials have cut out some of the less important information, but we really have not come up with exciting innovations in the area of curriculum. We haven't developed criteria for assessing the pre-packaged curriculum materials that are now on the market, although groups are working on them. We really haven't developed curricula that allows students to learn critical thinking and creativity or to develop these traits to an extent that we can say, "Yes, we are doing these things for boys and girls." We have not developed many courses that really spell out behavioral objectives; and we have not come up with evidence yet as to what difference, if any, that spelling out behavioral objectives makes in terms of the final student product at the time they now "graduate." We really have not determined the role of humanities or the behavioral sciences in school

programs, let alone properly define them. BSCS biology, as an example, is 100 per cent better than the biology programs that were in vogue prior to BSCS; and yet, that program, even the second edition, is badly in need of change and revision. It is still group-paced and discipline centered; we have only taken a step forward. We really need to challenge what we are doing in the world of curriculum innovations.

How many of the new programs are taught on an interdisciplinary base? We keep saying that knowledge is interrelated, yet we keep teaching as if there were no relationships whatsoever. In most of the schools we still try to teach at least twelve or more subjects as separate entities: communicative arts, theater arts, music, art, foreign language, social studies, industrial arts, home economics, mathematics, science, physical education, health, business, and other such departments. Now we can add environmental studies and child growth and development as probably the two most important.

Perhaps it is time to narrow the curriculum to two or three general areas. One might be, as an example, called communication. We might discuss such concepts as man and beauty. In an area called interaction we might study something like man and society or the effect of war on the individual nation. In an area called environment we might study topics such as man and nature and man and universe, or we could teach humanities, sciences, or unified arts. There are many ways to attack the problem; but rather than continue to teach twelve isolated subjects, we should find several alternative ways to interrelate the curriculum in a much more meaningful program for boys and girls. The concepts could be taught by learning teams of adults, which could be reconstituted whenever necessary. They could change for each concept, every theme, every semester, every year, or whenever it seemed best. There would be ongoing change in the curriculum. Only a few schools have begun revision in terms of interrelating knowledge. Even beyond this should be only one curriculum--all interrelated. It is difficult to do now; perhaps some merging will help schools move in this direction. A better way is to have students develop their own interrelated courses where the material makes sense to them and where teacher teams and personality matches can thrive. Curriculum centers are established and then merges are accomplished through individual or small group courses which are planned to meet a felt need.

Some schools have been very successful in merging the following combinations: Expressive Arts (the old English, art, music, and foreign languages); Environmental Studies (the old science, physical education, social studies, and health); Technological Systems (the old mathematics, business, industrial arts, and home economics). This combines the former academic and non-academics, it balances team numbers, it relates subjects with common pursuits, it forces the teams to overlap (math and science and English and social studies in different teams), and it gives recognition to special areas without isolation. We are finding that most special education students should be out in the regular programs about three-fourths of the day. This can be done with individualized instruction and team learning. Different possible approaches will be presented in Section C. Here all we are trying to do is to ask and analyze whether the continuation of departmentalization is best. As we approach the 21st century, certainly creative dreamers can produce a more viable organization.

Chapter 6

More Provoking Questions

For the 70's, we probably ought to have experiences that are learned almost entirely through an individualized and interrelated basis. Individualizing instruction does not mean one student always alone. It still involves the concepts of groups when groups make sense. In learning in the big barn concept previously discussed, the students operate most of the time independently. They select materials which they want to study; there should not be the formal courses most schools now have. If a student wants to learn in the area of economics, for example, he can work with consultants to develop the kind of program that would include the process and knowledge he hoped to gain. An individual student might be the only one in the school studying a certain phase of economics because this was meaningful for him at this particular moment. Again, "at this moment in time" is a crucial consideration in curriculum prescription.

On the other hand, there may be a group of students who are interested in a certain concept; each student may still work at his own pace and at his own speed. However, they may be brought together in small and large groups when needed to discuss the program or materials or concepts, or to share ideas and interact; we know that interaction is important in learning. In other words, in this big pool-barn concept, where the curricula is completely flexible, where there are no magic requirements of five days a week for each class in which at least 15 enrollees are essential in order to justify the existence of the course, a student may study the topics which appear to be relevant and at a level corresponding with the interest and ability to accomplish the goal. Teachers should not teach groups day after day but should act as motivators, stimulators, and tutors. This openness allows for completely individualized and flexible programming, with few constant demands, with continuous progress, and yet, still provides group interaction and laboratory experiences when and where needed and at the appropriate time.

In later chapters more detail will be presented as to how to individualize. There is always criticism from teachers that it is impossible to individually diagnose and prescribe. They claim that they are not trained to do this and that they will make mistakes. It is true that errors will be made; M.D.'s are not 100 per cent accurate in their diagnoses. But look at the mistakes being made now by educators. We diagnose and prescribe every day, but traditionally we do it by the group method. Everyone read this chapter, do these problems, or have this assignment ready by Friday. Day after day, all over America, teachers pretend to diagnose and prescribe; they claim all students in the class need the same instruction. Nothing could be further from the truth. Carefully analyze current educational practices in the majority of schools in the United States.

We will continue to make mistakes as we individually diagnose and prescribe, but not as many as by the group method; we have the time and the techniques. If we will stop trying to "cover content" and take time for individual conferences, we can do it. The tools for individual diagnosis are those we already have and use. The proposed difference here is that we should utilize a more formalized approach and application of these techniques.

Obviously, in order to do this the school's philosophy and organization must change. The six components discussed earlier must be dramatically revised. Schools will need capsules, contracts, unipacs, multiple reference books, paperbacks, programmed materials, filmstrips, tapes, single concept loop films, recorders and projectors, phonographs, and beefed-up resource centers. Current texts may have to be torn up and subdivided; curriculum project materials must be individualized; programs must be self-paced. Students need to write their own goals, develop their own quest activities and be allowed to pick from a smorgasbord of activities.

As we challenge the need for change, we must look at the whole concept of learning. What is the nature of learning? How do kids learn? There is a thought that says, "Effective oral communication is when students teach and teachers learn." When are we going to come to the realization that frame of reference has a tremendous influence on how students learn and how they communicate, what they understand, and what they learn in class? Do we really know all we need to know about learning? Learning about learning should be a major focus of pre-service and in-service efforts. Why isn't there a full-speed-ahead attack on the question of how individual students learn, and why haven't we done more to implement what knowledge we do have? Why do students still get D's and F's and drop out of school? Perhaps it is because we do not understand that learning probably does best occur when the students teach and the teachers learn.

What is the leadership role of the teacher? Have we ever analyzed classroom behavior? Do we know what is accomplished when the teacher stands up in front of the class and talks and talks? What kind of verbal communication results in good learning environments? What kind of communication is best for a teacher to use? Who is a successful teacher? What are the criteria for knowing whether the learner has accomplished the goals that were to be reached? Who set these goals? What about theories and knowledge in the area of instruction? Have we applied them to teacher training? Why is it colleges still lecture three times a week from 9 a.m. to 10 a.m. to young prospective teachers in a course called Adolescent Psychology and say, "Don't lecture to adolescents"? Have we really begun to analyze teacher supervision, as an example? Does the supervisory teacher who observes the student teacher from the back of the room and watches the verbal interaction that takes place in the classroom really know what to look for in terms of successful teacher behavior? What might be the role of the teacher in the whole world of simulation, games, and other teaching techniques that are beginning to be researched in some of the innovative schools? We really have not studied very carefully this whole area of the leadership role of the teacher.

As we ask more questions, what about students' rights? This is going to become one of the crucial issues in the next ten years. If some of the present change agent educators were students again in high school, knowing all the things that they know now, and if they were attending a conventional high school with bells ringing, hall passes, study halls, single textbooks, tests on Friday, final exams, and all those wonderful things that we have done to kids all these years--teaching them as if they were jailbirds--these change agents would be the leaders of student revolts. If students don't rise up and force educators to throw out many of the traditional worn out rituals, then the students are doing education and themselves a great injustice. Students should be urged to peacefully boycott; but even more, schools should eliminate the hangups that are causing student unrest. In most instances, the students are right, except in some cases where a few are spurred on by a fanatic minority.

At the present time, administrators are caught in a great dilemma. Students are beginning to exhibit dissatisfaction and are hammering at the administration. Teachers are going on strike and demanding negotiations. The adult is dissatisfied with the American society, and he sees the schools as part of the blame. Are the students right in their criticisms or are they wrong? And what about faculty grievances? As we look at the rights of students and the things about which they are complaining, we find many of them to be legitimate. They are exposing fundamental flaws in society and in the academic establishment. They are questioning values, as in situations where they understand that perhaps the war on poverty probably needs 50 billion dollars to tackle a task for which only 1.7 billion dollars may have been appropriated. They are saying that perhaps 80 per cent of the population must give up more of their income in order to correct the deficiencies we now find among the 20 per cent of the population.

If students are in conventional kinds of schools, we should be among the first to urge them to begin to demand some changes. However, rather than have them be forced to demand change, those who are in command of the schools today--the parents, school board, administrators, and teachers--should recognize that we need change and that we should offer this change before the students demand it. We should say to them, "We must change the kinds of schools we have. You are right in some of the criticisms you are making; therefore, please help adjust the learning situation so that you can have the kind of school you deserve for optimum potential."

Educators must analyze the traditional practices in the conventional schools and the newer practices that have been adopted by the innovative schools. We must challenge the flaws in the society and in the general educational systems. Rather than to constantly criticize each other and bicker and fuss and fight, educators together must take a look at the prospective changes in the society which are coming by 1980 and 1990 and in the 21st century. We must ask questions: "What are the implications for education of these prospective changes in society?" If we are going to achieve change, we must create an environment, a climate which can serve as a vehicle for successful renewal. It is often stated that the man who is educated is the man who has learned how to learn, who has learned how to adapt and change, and who knows that no knowledge is secure. If these thoughts are valid, then how many concepts are rejected by current educators merely because we are not familiar with the proposal and have not learned to adapt and change? How many ideas are rejected because they do not meet individual frame of reference criteria?

In the October 9, 1967, issue of U.S. News and World Report, the title of an article, "Airports of the Future," was of interest to educators. Part of the sub-statements read as follows: "Revolutionary Changes Lie Ahead--Airports Being Built or Designed Will Offer Fantastic Innovations -- Walking -- Will Be -- Almost Eliminated." The educational innovators could not help but think at that time, knowing how desperately airports need to improve, how the air industry can talk about revolutionary changes and fantastic innovations, and then proceed to accomplish these changes; in fact, air travelers actually encourage such new directions. As a contrast, look at education. Educators are usually afraid to openly discuss revolutions or fantastic innovations; in fact, many have a difficult time in some areas even talking about evolution. The question now, though, is before schoolmen: Should educators talk about revolutionary changes and fantastic innovations in the schools?

Some people have accused the innovators of moving too fast. But just review comments made by leading educators prior to 1920. For example, "Marks in the elementary school are not to be recommended, and at the high school level they are to be

patiently tolerated--only because of the requirements of the colleges which are based upon some such records--." "These concepts and these programs that we are laboring over today are by no means new--they are hardly revolutionary--we are not moving too fast--we are not changing too rapidly--we are not innovating irresponsibly." Yet, fifty years later we still have report cards in elementary schools; we are still tolerating Carnegie units because of the colleges, and we are still trying to convince people that new ideas in education are not revolutionary.

We are headed into technological, cultural, religious, and social revolutions and evolutions as we approach the 21st century; yet, some schools are still reading materials similar to such obsolete comic books as Buck Rogers--we already know how to go to the moon--and even worse, many schools are still tied to the single textbook--the basal reader, for example--purchased from one of the major publishing companies.

One of the reasons we are presently so concerned about analyzing current practices as related to change is the problem of the time span of adoption. We are all familiar with the early studies that generally indicated it has taken fifty years to bring about change in education, in terms of nationwide acceptance and implementation of the proposal. Some of the newer indications show that a few of the current innovations are being adopted more rapidly. However, as one looks at many of the changes suggested in the schools, one finds that the time span of the adoption curve still is basically true. About 2.5 per cent of the schools in America could be classified as truly and exceptionally innovative. Another 13.5 per cent could be classified as early adopters, 34 per cent the early majority, 34 per cent the late majority, and 16 per cent the laggard schools. From the time the laggard schools finally adopt something that the innovative schools started, often a fifty-year time span has elapsed, even for a change that we finally all agreed was worthwhile. For those who don't believe this long span exists, just look at the early childhood problem; until the advent of Headstart, only 50 per cent of the children in the United States had an opportunity to attend a kindergarten type program; some states still do not have publicly supported kindergartens. Yet, kindergartens are over fifty years old, and a full-day, individualized, five-year-old program has shown to be of tremendous value for most.

Education today, then, must embark upon a new speedway. In listening to such races as the Indianapolis 500, innovative educators cannot help but reflect on change in the racing industry. A few years ago the front engine Offenhauser ruled the race track. Their owners thought they had a very fine machine. Then along came the rear engine Ford. People laughed at it. Too small. Not durable enough. People claimed it would never replace the Offenhauser; yet, about three-fourths of the cars at a recent Indianapolis race were Fords. Only a few Offenhausers were still in existence, and then along came the turbine. It was better than the other racers; but what was the first reaction--yes, to reject it. Even the racing industry has difficulty in breaking traditions and allowing change to occur, but as witnessed by the acceptance of the Ford and now other new recent models, it is certainly obvious that they can do it much more rapidly than educators. Schools must join the educational speedway. We must move from the early Offenhauser to the latest designs, knowing that around the corner is another new revolutionary proposal.

We have to get used to change in education. We have lived too long with people whose feet have been solidly on the ground; we must now begin to get accustomed to living with people who have their heads in the clouds.

We are seeking new goals in education. For years, we have tried to go up the same side of the mountain. It seems we keep getting hung up on the same cliff. In taking the same path and in trying to reach the same goals, we have never been able to accomplish the task. In education today we are saying, "Let's take new paths; let's reach new goals." Certainly some of the things we have done in the past we want to retain; on the other hand, we now have additional goals and new ways of reaching all goals.

One of the newer goals that we are consciously seeking in schools is to develop self-directing, responsible, decision making individuals. In the past we have given lip service to that statement; we have never organized schools to accomplish this task. We want students to enjoy school and learning. We want them to look forward to self-education in a lifelong pursuit of meaning. We are interested in having them discuss concepts; we want them to learn about process; we want them to inquire, to discover. These things are more important than content. It is true we are still interested in content, but what content? We need to re-evaluate our traditional curriculum offerings. There is a fairly accurate cliché that says about half of what we are teaching is irrelevant, and the half we should be teaching has not been discovered.

One of the major reasons for change in schools is the terrific problem of dropouts or pushouts, both the in-school and out-of-school type. The in-school dropouts will be discussed later. Suffice it here to present a recipe for out-of-school dropouts or pushouts, by Hugh Wood, Professor at the University of Oregon. As one reads this statement, it is hard not to reflect on the kinds of programs we have for the many non-achieving students in school today.

"Take one poor American boy, give him as little love as possible, kick him around a bit at home, put him in an academic schoolroom with a subject-centered curriculum and a scholarly teacher who sees no hope for him. Fail him once or twice, never give him more than a "D," be critical, never praise him, treat him as a number rather than a person, and do not let him ever feel he belongs in school. Transfer him from one school to another occasionally, keep him out of school activities. Stir these difficulties well together, make him angry enough to play truant a few times, cook well in social class structure, burn to a crisp with sarcasm, and bake two or three years. This should produce something you can sweep outside or under the academic rug, but if you cannot get rid of him this way, tell him he has to take English with Miss Brown. If you want to frost this with a little juvenile delinquency, deny him a job the first 30 places he tries. If this recipe still produces a good American youth, try again."

As schools have begun to change, many individuals have tried to classify the issues and trends in instruction today. What are the issues which are forcing the development of a rationale for change?

In the area of diagnosis and treatment of learning disabilities, we must look at questions relating to psychological influences on learning, perceptual-motor training, self-concept and psychomotor influences on reading, and the roles of the cognitive, affective, and psychomotor domains, to mention but a few. In the area of teacher leadership roles and interaction analysis, we have yet to determine the most effective teacher behavior. Teachers have not been given research training; we are still disputing theories of instruction. Microteaching types of ideas are still just possibilities for improvement.

The whole concept of living in a global village is unexplored. What is a model city? How can education contribute to solving problems of crime, minorities, poverty, and slums? Should not school districts have local planning, research, and development centers? Teachers and negotiations and their roles in a global village as professionals, as decision makers, as participants in the problem of students' rights still are under revision. And in the global village, perhaps an experience called The Future, taught by a team of sociologists, psychologists, physicians, economists, scientists, anthropologists, architects, and planners, and focusing on 1980-2020, might be more relevant for current students than the present courses in the Ancient and Western Civilizations.

What about the scope of all of the coming changes? Are we talking about a rationale for change only in the United States, or has it become international? The latter is true as a number of other nations are now involved in studying and implementing new directions in education, indicating that several countries are beginning to awaken to the same problems we have in the United States. Further, the U. S. Office of Education has funded regional laboratories. Articles being written on change in education are coming from social scientists and other outside the field of education. The Designing Education for the Future Project, the National Institute for the Study of Educational Change, the Educational Facilities Laboratory, the many university centers where professors are studying the change process have been additional indications. Innovative leaders like J. Lloyd Trump, and the number of experimental schools developing throughout the world are showing that the scope is more than local; it has become national and international. There is a growing awareness of the need for change in education.

One of the reasons for this new vision in the United States has been federal funding. Title III, for example, has enabled school leaders to consider projects to advance creativity in education by establishing centers which have encouraged the development and demonstration of worthwhile innovations in educational practice through exemplary programs and through supplementing existing programs and facilities. Title III has been involved in the processes of inquiry, invention, demonstration, and adoption, thus helping overcome some of the major problems we have had in the past in developing a rationale for improvement. In spite of all recent criticisms of, and flaws, in Title III programs, Title III has been a fantastic contribution to change.

To be significantly successful, though, we certainly need further visions. For example, why don't we have electronic bluebirds? Why should students spend as much as two hours a day on a school bus looking out of the window? Couldn't those two hours sometimes be spent in individualized instruction through computers, dial access, tapes, and other media? Certainly the school bus could become an automated arrangement. We may have helicopters taking school children rather than buses; the next step then would be electronic whirlbirds. These things may be out of the question at the present time, but already students in Kentucky and Mississippi are learning through materials from automated centers in California and there is an electronic bluebird in Colorado. Perhaps whirlbirds will never come to pass, but the ideas of students being transported in some other fashion than spending two hours in buses will eventually lead to improvements in this area. It must be remembered, though, in favor of the present system, that for some of the students, and they should be identified, perhaps the 360 hours that are spent talking with friends on the bus is the best way for them to spend their time. However, a number of students could certainly benefit from some other use of the 360 hours.

One major problem we have always had in education is called calculated apathy. is another word for complacency. We have been so content with the status quo

in most communities that we have been unwilling to change. As we begin to develop a rationale for revision, we are going to question some sacred cows. Questioning sacred cows causes emotional upheaval. Generally, change seems to occur through upsetting experiences in a supportive climate; in other words, the needler from outside upsets the status quo inside. However, on the inside is a handholder--a superintendent or other who can support the concept that change will not occur without planning. This type of approach toward eliminating calculated apathy leads to consent and consensus, and thus situations where the community is prepared to accept change.

If one looks back into some of the history books, it is easy to develop a rationale for renovation, especially if we believe we have better ideas now than we did 200 years ago. If we look at a picture of a classroom in 1770, we find a teacher sitting on a little platform listening to children recite while the others sit on benches; the dunce is in the corner. One hundred years later, 1870, the picture shows the teacher still seated listening to recitation; but she is down off the platform and the students have a type of crude desk. As we reach 1970, tragically, the situation is basically the same. The teacher still sits listening to a group recite. The students have been jammed into desks probably no more comfortable than they had in 1870, and they are engaged in busy work. Little has changed in terms of classroom organization in 200 years. Hopefully, in the 70's we will find more schools with programs that eliminate thirty children sitting in desks facing the blackboard.

As we talk about a philosophy geared to change, we certainly want to discuss and plan for different teacher-pupil relationships. In most schools we still have too many teachers who say "go to the office, John." There is a negative approach toward boys and girls. Discipline and control of the environment are seen as the most important factors. In the new kinds of schools we want teachers to say, "May I try to help, Johnny?" We want sunny bright kinds of environments where teachers are not concerned about control but are concerned about the needs and interests of each of the individual students. We are not concerned about imposing the authority of the teacher upon the student; rather we are concerned about working with the student to help him become a self-directing, decision making individual.

In this situation the organization can develop a fifty-fifty relationship with students, not a ninety-ten relationship. Most schools now find ninety to one hundred per cent of the decisions made by the principal or faculty as the voices of authority. Students do not have a part in deciding what is best for them. In the new schools, at least fifty to eighty per cent of the decisions are made by the students. This means that adults are going to have to study new methods of learning and instruction. They must review, in light of the learning and instructional concepts now available, the kind of curriculum that is relevant to students.

Teachers must decide whether their emphasis is going to be on content, or whether it is going to be on the development of logical thinking, discovery, and inquiry techniques. Are they going to permit and encourage the students to question the authority of the content, of the textbook, and of the decisions made by the adults?

An analysis of current practices certainly includes revision in the university and teacher education programs; the Old Ivy Tower must change. This business of the college professor being an expert with prestige but confused as to whether his role is to teach, research, or write must be reviewed; the traditional academic

senate and the publish or perish routine must be eliminated. Can we put up with fifty more years of segmented departments in colleges, and Ph.D.'s who know all the answers? Can we continue to put up with colleges which insist upon grade-point averages and Carnegie units, Monday-Wednesday-Friday lectures, final exams, rigid schedules, required attendance, egg crate rooms, and ringing bells? It is amazing to realize the number of colleges in the United States still ringing bells and relying on the course textbook. There are very few innovative colleges in the United States. Teachers are not being trained to teach in innovative schools. Administrators are not being trained to plan for change; and yet most Americans are quite sure that the society of 1980 and the society of 2000 will be entirely different than the present. When are the Ivy Towers going to change?

Considering that right now teachers really are trained in the general culture and not in colleges, it causes wonder as to why we even have colleges of education. For example, watch six-year-old children play doctor; they give a shot, use a stethoscope, and give the patient a pill, but that is it. They cannot perform the other functions of the doctor because they must go to school to learn these. However, watch children play school at age 6; little Mary can do everything the teacher can. She can scold, put students in a corner, assign them workbooks, have them sing a little song, sit in a small group and read a book, and have them go out for recess. There is little need for the present colleges of education. If teacher education is to become meaningful, we must take a look at what the schools of the 90's probably are going to be like. What will the general functions of these schools be? What will the social functions of the school be? What skills, concepts, and knowledge will be needed by individuals living in the society as the year 2000 approaches?

Fortunately we are beginning to see a few new programs in teacher education. Some schools are saying goodbye to student teaching, methods courses, college supervisors, 20-30 hours of required education courses, development of multi-purpose teachers, the socialization and intellectualization of teachers as goals, college professors' stuffy lectures, traditional final exams, the single textbook, and rigidity and sameness. The colleges of education must teach the way they expect teachers to teach; they do not expect teachers to lecture three days a week.

We have evaluated the present teacher education programs to some extent and found them inadequate; thus, hello innovators. Fortunately, around the country there are about fifteen colleges and universities that are trying different ways of educating teachers. They are looking for better solutions. Part of the problem is to evaluate these new efforts, to measure their effectiveness, and if seemingly effective, to encourage the universities to go even further.

We are getting to the day when we will have differentiated teaching staffs, and colleges must train people for these positions. More and more master teachers will be hired to work on a twelve-month contract; some teachers will diagnose and prescribe while others will carry out part of the prescription. Some of the experimental college programs say that behavioral changes of teachers occur in a clinical approach. Are microteaching, individualized projects, simulation, T-grouping, and sensitivity training the ideas which are going to help in teacher education programs? Should we start freshmen in college into the teacher education program via work in the schools, or should we wait until the master's program as some colleges propose?

Certainly these questions, in terms of new directions of teacher education, are illustrative of the kinds of programs we must consider if change is going to occur, not only in teacher education programs but in all schools, Pre-K through graduate degrees. Further, consideration must be given to the problem of teacher certification. We are so stagnated in the belief that 18, 22, or 32 hours of education courses make a person certified; and we are so certain that we can separate an elementary teacher or child from a secondary teacher or child merely by deciding upon labels called "6th grade" and "7th grade" that we seem to have lost all hope at present of ever improving teacher preparation. Fortunately, a few are grumbling at the absurd way we certify teachers. One of these days the revolutionaries are going to have their day in court and out will go the present inflexible magic requirements. The situation is further almost hopelessly entwined in some institutions when it is realized that perhaps 80 per cent of the college training is in the school of liberal arts, not in the school of education, and the liberal arts professors have been some of the worst offenders.

Even more, besides the revision of the present state department rituals regarding certification of teachers, out will go the horrible regulations now in force regarding high school graduation. In some states, for example, all high school students must take four years of English, three years of social studies including one in the senior year, two years of physical education, one year of math, and one year of science. No art, music, industrial arts, home economics, foreign language, or business education is required. Just what research is there to indicate that three years of social studies is more important than art for all students or for that individual student? What does social studies in a senior year do for an individual? Does he enlist in the Army, wear his hair shorter, vote more often, or what?

Regulations regarding high school graduation and teacher education are obsolete. Even if most educators could agree on some of them, there is no research to support their claims. The idea of high school programs based upon the demands of college entrance is equally questionable. High school people know more about student needs at this level than do the colleges. There will come a day when there will be a mass overhaul of high school and college graduation requirements and teacher certification. In the meantime, innovative educators should do everything possible to circumvent regulations which work against the needs of the individual. One day, for example, secondary principals of a given state will just refuse, as an association, to honor state department and college rituals. That day will be the dawn of a new era for the students of America.

Until recently very little was known about successful teacher behavior. After all these years of teaching, we still really know very little about what methods and what personalities are best for a teacher; subjective ratings have usually been as good as objective ratings. We are beginning to reach conclusions, some of which have even seemed to indicate that organization makes very little difference. Of course, the effect of the differences which have been studied have been measurements of traditional academic achievement in the cognitive areas, such as the Iowa Test of Basic Skills. They are not evaluations of environment as related to new concepts, such as responsibility and decision making. The whole area of teacher methodology needs a great deal of research.

As we enter the 70's and look at individuals in teaching, we find that some teacher characteristics do make a difference. We are beginning to find some evidence, for example, that teacher warmth seems highly defensible; that indirect approaches are more effective than direct; and that teachers who exhibit valid cognitive

structures in their subject fields seem to have more success. The further question is, can science contribute more to the prediction and evaluation of successful teaching? Can new technological advances give some answers as to successful teacher behavior? Certainly this whole area of not knowing what makes a successful teacher points out vividly the need for evaluation of the total education systems, not only the traditional but innovative proposals as well.

One approach to summarizing the questions and suggestions made in this chapter, as related to the analysis of current practices and rationale for change, is to suggest that as a way of starting on a broader scale than just the local school level, the districts, and regions might hold dreamers' conferences. Invited to these sessions should be sociologists, philosophers, psychologists, industrialists, scientists, physicians, and educators. These groups should discuss as well as they possibly can where education is now, and then contrast that picture with visions of where it ought to be now and where it needs to go. Out of these conferences should grow a commitment and plans for change and ideas as to how to change if schools are to catch up and keep abreast of the coming world. Besides the here and now and the very near future, the dreamers' conferences should focus on the question of what will education be like in the year 2000? For example, probably school buildings, as they are presently known, will dramatically shrink in size as the school in the community and home computer system are available. Speeding up and immediate retooling is needed and will help. Further evaluation and reflection must be built into the change program, but communities should have as their long-range goal a different kind of education for 1980, 1990, and the year 2000; schools must commit themselves to on-going innovation. If ever there was a time to develop a rationale for change in the schools of North America, that time is now.

Chapter 7

Evaluating Program Effectiveness

In Chapter 5 we attempted to analyze present practices; now we face the task of evaluating them, regardless of whether the practice is considered "innovative" or "conventional." Probably the biggest deficiency of past educational efforts is that we have failed in both "new" and "old" programs to really accurately evaluate what has happened to students. Most of the programs and procedures in the schools, and especially those of the traditional programs, have been based upon whims, individual beliefs, group compromises, age group achievement tests; they have not been based upon sufficient evaluation and research. We must make a commitment then, as we begin to innovate, not to repeat the same mistake that the conventional schools have made all these years. The only evaluation we really have had in schools for the most part, is evaluation of content, and that content which was chosen was based upon authoritarian decisions of teachers and administrators and testing and textbook companies; these groups decided what items were really important for boys and girls to learn; most of this material has been irrelevant.

As we look at the 69 or more elements, renovations, revisions, and renewals that are now upon education, we must ask: "Have these new proposals made any real difference? Will they in the future? Have such notions as self-direction, responsibility, decision making, behavioral objectives, continuous progress, affective domain, diagnosis and prescription, perception, individualization, team teaching, flexible scheduling, team planning, non-grading, unipacs, new curriculum projects, new directions in teacher education, conferences on change, workshops, large and small group instruction, independent study, retrieval systems, computer scheduling, resource centers, acoustical flooring, human relations, planning centers, pods, T-grouping, student centers, television, and all the rest actually improved the process of education for the boys and girls of America? Have any of these really made any difference in the classroom--any difference for Pete and Sally--and if so, has it been a positive or negative difference?"

There is really nothing very new in evaluation methods. The innovators here have few secrets. We already know what methods of evaluation are available and how to use them. The basic problem is a failure of the American system to build in and provide for true methods of evaluation of any of the programs. What we have done in most districts is to rely on so-called standardized achievement tests and teacher judgment report cards, which really said very little except to reinforce the notion already known, that schools are failing to meet the needs of a society in transition. Now unfortunately, the new accountability movement is reinforcing obsolete evaluation. There is nothing wrong with the concept of accountability, but it must be revised. We now need INNOVATION IN EVALUATION. We need new directions for evaluation in the affective psychomotor domains--for such concepts as responsibility and self-direction.

In the meantime, while waiting for the needed new approaches, if we use present knowledge, if a school or district decides to begin a thorough evaluation, the methods are almost too simple to suggest. First, we must ask whether present programs are meeting their objectives. This is not just more philosophy; if we cannot clearly state objectives and then measure success in attaining them, we

are in trouble before we start. Most schools, however, have not objectively accomplished this task. More reliance must be placed on subjective evaluation.

Once we decide to look at objectives and become involved in a continuous, for-evermore, process of on-going evaluation, thoroughly questioning success, we pose some additional dilemmas. Should we change again? Obviously, to attempt an answer, we must first complete the task of gathering information to determine whether the original objectives have been reached.

To seek the conclusions, we need to ask six fairly simple, basic questions--ones we have all asked before but sometimes have not carried through to completion: WHERE, WHAT, WHY, WHEN, HOW, NOW.

The first of these, a continual probing that must be part of the constant recycling which occurs under the concept of on-going evaluation, is merely the above plain, unsophisticated query: WHERE are we? What have we actually accomplished in the schools? What are present schools like? What is happening to boys and girls attending them? Are we satisfied with where we are, or do we need to change?

If we decide we would like to consider making some changes, WHAT revisions do we want to make next, assuming we have decided to innovate. Then, are we really clear as to WHY we want the revision--a flexible schedule, for example--or are we doing it just because it seems to be "the thing to do."

The following question is WHEN do we want to make the changes? It is important to know whether we plan to make the change immediately, or in March, or not until next September. A fifth inquiry we must continually make, once we accept the concept of an on-going process of evaluation and have asked where, what, why, and when, is HOW can we best implement the proposed change? The HOW is where we discuss the nuts and bolts as to whether these things can possibly be achieved. Finally, the NOW are we any better? And that completes the cycle and starts the staff all over again, for we are soon back at the WHERE are we stage; in planning innovation, we must provide for evaluation.

There are several types of evaluation; we must know what we are aiming for at the particular moment. Are we interested in the continuous day-by-day assessment that must occur, or the constant input that is necessary, or a check on the logistics of the experiment, or the end result? Process evaluation is pretty much a day-by-day, year-by-year continuing approach. Product evaluation may be after one, two, or fifteen years. We have to know whether we are after process or product or other types of evaluation at the time we evaluate. We further have to know for whom are we seeking answers: for students, for teachers, for parents, for developers of new programs, or for the funders, such as national foundations which might be providing financial support to the project. We must ask what kinds of items we are trying to evaluate. For example, evaluating curriculum materials may call for a look at the scholarship of the curriculum package; it may call for a look at the reality situation on which it is based. One thing for sure, the conventional college textbook experimental design is not always best; it is usually impossible to control all the variables in school.

The next concern in introducing the problem of evaluation revolves around the notion that evaluation is a MUST. We can no longer afford to continue to run traditional schools or to attempt to innovate without knowing what we are doing. But if evaluation is a must, what is evaluation? The resisters to change like

to get the process tied in semantics, and here is one area they attempt to control; as usual there is no easy answer; there are many definitions. It might simply be fiscal accountability for the tax dollar, or it might be termed a systematic approach to gathering knowledge or information, or it could be, as the dictionary might say, determining the value of, to examine, to judge; but regardless of what we finally agree upon as a definition, we need to evaluate.

As in most processes, there are several steps in evaluation that must be completed. First, we need to identify objectives. What is it we are actually trying to do in the schools with boys and girls? Secondly, we have to implement programs to reach those objectives. And then third, we must gather information to answer the question; have the programs that we implemented allowed the school to reach the objectives? There are at least 250 procedures for gathering this kind of information, arranged from simple surveys and questionnaires to rather elaborately prepared laboratory procedures for research in the area of psychological, psychomotor, and physiological development.

In attacking this problem of evaluating change, rather than to try to lay out a prescription as to how we can evaluate, the techniques that are possible, the 250 procedures that are available, or specific projections as to how a school might set up an evaluation program, in this chapter we will take a different approach. There are many people who are researchers, who are evaluators, who are trained in this field, and who can do a much better job than possible here in spelling out how to set up evaluation projects. If we are in a rural area and away from the so-called experts, we must get hold of some written materials, make some phone calls, use current regional laboratories, and otherwise search for potential help to establish an evaluation format. Illinois, Ohio State, and Syracuse Universities, for example, currently are heavily involved in new directions in educational evaluation.

What this chapter attempts to do, in terms of evaluating change, is to give a series of examples as to why schools must evaluate, and why educators do not really know the answers to the reasons the present schools are conducted in the manner they are now. We want to look at the evidence we have already about schools, and point out the fact that we really have not evaluated traditional programs; the defenders of the status quo expect the innovators to produce the evidence; there is no reason we should defend innovative programs anymore than they must defend theirs. But rather than take the negative point of view, knowing that traditional schools are in error because of their failure to evaluate and to change where what little evaluation they have does show them to be in error, we want to take the positive side. Innovators want evaluation of their programs even more than the traditionalists and even insist that information be gathered so that results of the effort are available and are used to improve the school.

In the preceding paragraphs, broad statements have been made concerning a commitment to the area of evaluation. Now it is time to look at some of the research that is going on throughout the country to show perhaps a little more clearly why evaluation is such an important factor. Most educators are aware of the research and development centers which have been established around the United States. In 1956, the U. S. Office of Education spent about a million dollars on educational research; in a recent fiscal year, it spent about one hundred and seventeen million dollars. The R & D Centers that were established a few years ago at such universities as California, Stanford, Georgia, Texas, Pittsburgh, Oregon, Wisconsin, and others, were formed to study such areas as higher education, teaching, individual differences, behavioral sciences, educational administration, and other important topics.

Sociological considerations are coming into the picture. We know from results of Title I that those programs, in the original stages, were deficient in changing teacher attitudes. In the medical area, in one small study alone of 97 children, 95 had intestinal worms; others had such as broken legs, deformities, and heart murmurs; one third of the Headstart children in the early studies had health defects and 31 per cent had major physical defects; 2 out of 3 needed dental work; 10 per cent had severe psychological difficulties. We know that the projects with the greatest apparent success were those with the greatest involvement with parents. We know that minority groups of any kind can compete successfully with the majority groups when provided the opportunity and the frame of reference. With these kinds of evaluations in the area of sociological considerations, what do we do about the poverty home situation; what differences do sociological problems make in learning rates at school? Is premium pay for teachers who work in the poverty areas part of the answer? Are educational parks part of the answer? Are residential schools and dormitories part of the answer? These are the kinds of evaluation we must have and the type of research to which we must commit education if we are to know what to do with these boys and girls.

The adult education situation is not any better. Project T Square was involved in training 22,000 illiterate adults to read. Some of the enrollees had as high as seven children. There are several million adults operating in the United States below the traditional sixth grade level. We know that the base of wealth is shifting from land to human resources. We know that education can have a retarding effect or a positive effect on the national economic growth.

Look at the situation in former coal mining areas as an example of the shifting base of wealth. We are faced with the gigantic problem of eliminating obsolescence. Can we afford to spend millions of dollars developing a new automobile model and more millions for retooling it and yet continue to have in the United States Project T Square conditions? What about an evaluation of values as regards the adult community? We don't have community colleges in so many areas; we should have them in every region or every major city in every state; there should be an opportunity for a student to take transfer courses, or terminal courses, to selfsearch, to eliminate obsolescence, or to become involved in some adult education program as a means of renewal and retooling. What kind of learning is important for human resources?

We have further statistical support. We know that jobs for the high school graduate rose 40 per cent in the past 10 years and decreased 10 per cent for the non-high school graduate. We know that the best schools and the best teachers are generally in the suburban areas and the poorest in the slum and rural areas; yet children in the slum and rural schools are more affected by poor teachers than those in the suburban schools. Figures a few years ago showed it cost about \$450 per child to educate a person in school, but \$1,800 for delinquent youth in a home, \$2,500 for a family on relief, and \$3,500 to support a criminal in the state prison. If more than \$450 per child were spent on education, and if the educational programs were revised, could we prevent some of the money being spent on family relief and state prisons?

Look at education's artificial requirements and rituals: trying to teach reading from 9:00 to 10:30 every morning as most elementary schools do, sixteen credits for graduation, two years of foreign language to enter college, 225 minutes per week to be accredited. These practices and more, such as dividing students into bright, average, and slow groups or caste systems, have led in the past to a third of the students being pushed out of school, another third being in-school

dropouts, and another third going on to college; of this latter third, the majority later drop out of college. What does a student need to be successful right now? What does he need in the future--we really don't know for sure. What are his abilities, what are his interests? Programs need to be developed on individual needs, not on artificial requirements.

The studies now underway in intelligence seem to indicate that there is not one I.Q., but instead 50 I.Q.'s; in other words, there are fifty ways of being intelligent or fifty ways of being stupid, whichever way a person prefers to be classified. There may eventually be uncovered at least 120 distinct abilities for each individual. Unless we know all of these individual estimates, we do not know the potential of that particular student.

We are faced with studies which seem to indicate that half development of selected characteristics occurs by certain "grade" levels. For example, general intelligence seems to be half developed by age 4, and general school achievement by the traditional grade 3. General intelligence appears to develop as much from conception to age 4 as it does during the 14 years from age 5 to age 18. A review of many studies seems to indicate that teachers in the initial years should be the best trained in the system, that the ratio should be at least one adult for every ten children, and that extensive diagnostic service for children and specialists to help teachers should be available at the Pre-K through second year periods. More money should be spent in the first three years of school than in any other three years, and yet, do we follow through with this particular research? No, schools still organize on the self-contained basis, with 25 to 30 children with one teacher in the first grade; the most money for any three years is spent at the secondary level.

Look at the research we have on so-called graded students. We know that only about 16 per cent of the students at any grade level are actually at that grade. In one school district a study of the 7th graders showed that 50 per cent of the students fell between the ranges of grades 7 through 9, the typical junior high. The other 50 per cent fell outside grades 7 through 9; their range of achievement was grade 3 through 13. Yet we continue to have 7th grade programs where all of the students have the same book and do the same work at the same time. How can there be a 7th grade curriculum guide, a 7th grade textbook, a 7th grade class, when there aren't any 7th graders? Out of a typical class of 28, only 5 really are so-called 4th graders; the other 23 fourth graders in the class range up and down the ladder of achievement. What are the implications for curricula, teaching strategies, and school organization?

Physiologically we know students in little league baseball, with chronological ages of 9-12, actually range from 7-15. In spite of this, we still use chronological grouping; all over America we continue to put boys and girls into classes of 4th grade based on age and give them the same program at the same time. Some schools have tried to solve this by setting up levels or track systems which have been even worse. In physical education we stuff students together on the basis of chronological age rather than on physiological age, and then give group prescriptions rather than individual prescriptions to meet the needs of these students. When are we going to pay attention to the research and evaluation that we do have?

If we are not convinced yet of the evaluations which show conclusively the enormous spread in individual differences, look at physical fitness index scores in a given school. A PFI of 100 is considered "average," though we know "average"

means little. The thing that is important here is the spread of individual differences. In one junior high, for example, the spread of PFI's at the 9th grade was from a bottom score of 45 to a top score of 195; the 8th grade range was from 55 to 185, and the 7th grade from a low of 50 to a high of 170. The lows and highs are like trying to match a double motor moron against a double super all-star, yet coaches and administrators continue to talk about and schedule 7th grade physical education classes where all the students play flag football at the same time, in spite of the fact that some of the 7th graders are only 4th or 5th graders developmentally and others are 9th and 10th graders.

Research is really very poor in education. When curriculum projects such as ITA come along, how are we to know whether or not these are better, or worse, or about the same, in terms of communication programs. Some districts adopted ITA almost overnight with very little research. Others refused to even consider it. Certainly if every district in America refused to try ITA, how could we ever develop any research and evaluation as to whether or not this might be a better way to help boys and girls communicate. On the other hand, if we all plunge in without any research and never did much followup to determine the effect of the program, of what value would this be? But certainly curriculum projects that are developed, such as ITA, could hold tremendous promise for breaking reading codes for many students. These projects need to be carefully evaluated, but not to the point that all wait four or five years for somebody else to do it. Each educator has an obligation to take new materials that are developed and consider adopting them. If there are a number of projects going on near a school, or in a particular state, obviously each district may not have to jump on the bandwagon for that project until some research is available, but there has to be some evaluation. Maybe each district, in a cooperative regional approach, could tackle one program new to that area.

As we look at curriculum, consider the continued emphasis on grades such as A, B, C, D, and F. The curve still holds in most districts; overall, when comparing numbers of grades given, teachers in a class give 3 A's, 6 B's, 12 C's, 6 D's, and 3 F's. Some of the teachers are beginning to ask themselves a rather soul searching question: "Couldn't I reach more than 50 per cent?" We certainly don't reach the D's and F's; we certainly don't reach some of those C students; how many of the A students could have had AA if we gave such a grade, and allowed them to progress at that level? If the current unemployment statistics continue, by 1975 32 million adults will be on the labor market without a high school diploma. We still have college dropout rates of 60-75 per cent. Fortunately, some teachers are beginning to say, "I am a good teacher, but I am looking for ways to become a better teacher."

As they begin to evaluate their teaching, they become concerned about individual differences. They ask themselves: Are we teaching groups or are we teaching individuals? Oil and water do not seem to mix. Neither do individual differences and conventional report cards. If there are 400 students in a school, there should be 400 individual standards, not one or five group standards. Obviously this raises the question as to whether there is a role for group standards. If so, what is that role?

We must eliminate this reliance on A, B, C, D, and F. If we believe in individual progress, individual differences, and individualizing instruction, we can no longer continue to look at 10 per cent of the students as A's, 20 per cent as B's, 40 per cent as C's, 20 per cent as D's, and 10 per cent F's. And yet some teachers still grade on the curve.

We need to look at student evaluation differently; we must look at individuals. There are many ways we can do this; class rank, grades, and credits should go out the window immediately. We need a new era: high schools need to revolt against the colleges. Every state in the union could eliminate grades overnight if the high schools in that state refused to send the state colleges such items as grade point averages, grades, and class ranks. The colleges would soon figure out a way to admit the students. Their jobs depend upon it. In the meantime, we need to individually diagnose the individual as to the progress he has made in his individual program. As was made so clear in the eight year study of the 30's, there should be a whole new era in appraising and recording student progress.

There are many ways to make a start in these directions, even if complete elimination is not possible immediately. A few moderate communities are giving both the standard A, B, C, and then a second grade called his individual progress grade. Thus, a student might receive an A when compared with others, but only a C in terms of his individual growth. Others have substituted actual scores in subjects where this is appropriate. For example, Sally types at 40 words a minute with two errors. The group mean of all beginning typists is 30 words a minute with four errors; Henry types at 10 words a minute with seven errors. Now Sally doesn't get an A, and Henry an F. They get a record of what they are actually doing; Henry hasn't failed--he is typing at 10 words a minute with 7 errors.

A few communities have ventured into a superior, good, pass system; they are giving only three grades instead of five. No student receives a D or an F. Either he completes the work to the satisfaction of the objectives established for and by him, or he just doesn't get credit. In other words, he either completes the course at a certain level of success, or it just isn't recorded; it is neither a failure or a pass--it is just as if he never attempted the course.

But only a few are on the cutting edge--only a few have eliminated all pass-fail, or SPG, or ABC systems. Only a handful of districts in America have taken a bold new step. Fortunately, some of the most innovative educators in America are exploring for something better.

In replacing the old report card systems, there are basically four steps that must be taken to ascertain the individual progress made by each student:

- (1) Diagnosis: Each student must be individually diagnosed for his strengths, weaknesses, and his progress to date in the area being considered. Student input in this process is essential.

- (2) Prescription: On the basis of the diagnosis, which reveals the individual's needs, interests, and abilities, a program must be planned in conjunction with and for each student.

- (3) Evaluation: Every few weeks, through individual conferences, checking folders, and other such devices, the progress of each student must be ascertained. We must know how the student is faring with the prescriptive program planned for and/or by him or her.

- (4) Alternatives: As the progress is ascertained, there may be a need to re-diagnose or re-prescribe; the program may be too hard or too easy or may not motivate; it may be that the present program seems appropriate and therefore the

the student continues. There must be alternatives; this ultimately leads to a re-cycling so that a constant check on progress is available.

To report this to parents, other schools, and colleges, several formats may be used. However, they must include at least three major items:

(1) A summary of the program pursued by the individual--the parents and colleges should know the experiences enjoyed by the student as a partial measure of his or her goals, interests, and abilities.

(2) A subjective evaluation of the progress made in the affective, psychomotor, and cognitive domains.

(3) Subjective observations of the future should be started; in other words, based on the progress made in the learning experiences, what possibilities seem open in the future for the student?

Another more complicated method with additional but sometimes unnecessary information, provides reports for the colleges which include many test results; columns indicating the program pursued, the objectives attained in each area, and a subjective recommendation as to the future. Colleges could thus receive a report in the area of mathematics which would be a four column summary of the student's achievements: column one could state the math programs pursued in high school; column two could report the objectives attained; column three could relate scores on standardized tests in math (but only tests which attempt to check on the objectives sought), and column four could describe the recommendations of the math teachers in regard to anticipated future potential in the field. Record sheets in each area, including activities, some of which could eventually be computerized, would certainly be more meaningful than grade point averages. Some colleges and some employers want less information. Some only want a description of the student and a listing of the work pursued. Information could be streamlined depending upon the individual college or employer. More detail related to this topic is discussed in the chapter on "Reporting Student Progress."

As we look at the evaluation of individual students, we must keep an eye on future developments. What about the chemistry of learning and memory? Will we within ten years actually be enhancing learning with an arsenal of drugs? Will we truly discover and be able to use at the practical school-level drugs that may affect different parts of the learning process such as analysis, memory, and comprehension? It sounds fantastic and maybe is, but on the other hand, such a development could be just around the corner.

And what about the future of technology. If it is true that we double the world's knowledge about every eight to ten years now, and that it takes 100-200 professional hours to presently develop one good hour of professional material, which becomes obsolete in five to seven years, what are we going to do with present and future curriculum developments? What role do such terms as microfiche, microfilm, random access, rearview projection, microfilm, readerprinter, terminals, microfiles, microtransparencies, dial access, and computer based instruction have in the classrooms now being constructed? Certainly an evaluation of the total classroom procedures is going to be forced upon educators in the very near future.

Physical classrooms and construction methods and styles are finally being evaluated as we reflect on the present schoolhouse. In spite of the view into the world of 1980 and 1990, we still continue to build monuments to memory. Many of the schools

being constructed now may be standing in the year 2050, and yet we know that these traditional schools with solid walls and rooms 28 x 28, or whatever the dimensions might be, are already archaic. Twelve per cent of the school buildings in America are pre-1900 vintage. Another 36 per cent are pre-1920. Why is it that half of the school buildings in the United States are obsolete, in terms of facilities and educational programs, and yet communities will not move forward to eliminate these worn out buildings and the programs they house? Schools should be built for only 20 years and then be replaced. We haven't sold this idea to the American public. Instead, we turn around and build a new school designed along the lines of the past egg crates. Only one-sixth of the cost of the building is the initial construction. The upkeep and maintenance makes up the rest.

Should we remodel or replace old buildings? Certainly when the cost of remodeling approaches 50 per cent, we are justified in demanding a new building. Yet most of the schools in America are going to have to be remodeled more than 50 per cent. If we can build instant campuses in 70 days, what is next? If educators had the billions of dollars that have been spent planning supersonic airplanes and ABM systems, could we really do a better job of evaluating and designing educational programs? Could we truly develop an educational supersonic? Would we come up with geometric domes, with paper rooms that could be modified in a moment's notice? Are the buildings currently being designed really going to make significant contributions to the growth of human resources? Most open concept schools have forgotten, for example, to include mousey quiet areas.

And what about programming-planning-budgeting systems? Is the money we are spending in education really being spent as effectively as it should? Knowing that we are short of money, could we not make the funds go further? Have the program objectives been identified behaviorally? Should they be? Have we compared outputs with cost? If we state the objectives behaviorally, we should be able to measure them, and if we can measure them, we should be able to come up with a cost analysis as to whether or not the objective that has been reached is in line with the cost. Have we developed specific measures of effectiveness in the schools? What about those areas where behavioral objectives may not be the best approach? How do we measure cost effectiveness then?

We are going to have to evaluate comparisons of alternative methods in education. We must stop saying, "This is the way," but instead should say, "These are possible ways by which we might accomplish the task." A basic philosophy of innovation programs is to offer alternative ways of accomplishing the tasks, along with cost analysis. What price is excellence? How are we going to re-allocate resources? We can block or promote educational change with the way we plan financial expenditures. If we look ahead and put one per cent of the total budget into planning, we can avoid paying \$18,000 an acre, as we have in some suburbs now, when a few years ago we could have spent \$2,000 an acre for the same land; but we must remember that whatever the decisions, budget A must equal budget B in the final analysis of money available.

In the preceding paragraphs, we have made some general statements about a rationale for evaluation. It has been said that innovators are not evaluators and this is basically true. And probably innovators should not be evaluators, although we must develop innovative evaluation. Evaluation should take place by an outsider--"out-house" evaluation--someone removed from the innovation, someone who can look at it objectively. But each school or district should do its own "in-house" evaluation, too. We are beginning to get subjective evaluations of what we are doing as we try to change the American schools; we are getting surveys, and opinions, and

attitudes; we are trying to look at this problem of self-direction and responsibility; we are getting some objective evidence. We can look at things such as attendance reports, discipline, library circulation, and achievement tests; we can set up control versus experimental groups. But we must go far beyond the traditional evaluations which occur in most schools today.

For example, we have talked about the concept of student responsibility. How do we measure student responsibility? How do we measure an individual's ability to make decisions, to make value judgments, to accept responsibility, to use time as a tool? What tests do we have now to determine how much responsibility Mary had in September, how much more or less in June? In the elementary schools, in the junior and middle schools, in the high schools, students must have opportunities to decide during the day where they want to go--to the snack bar, to the media center, to the patio, to study, to the art room, or to a number of other places that are available to them. We must have alternatives for students to select if they are going to learn to make choices. Most innovative and traditional schools state that one of their prime goals is to develop self-directing, responsible, decision making individuals. If this is a prime goal, how are the schools going to measure their success? And yet this must be done; it is beginning to be accomplished in some of the forward-looking schools. More reliance must be placed on subjective analysis; control versus experimental "objective" designs are not always possible or desirable. Evaluation must be conducted in the affective and psychomotor domains as well as the cognitive.

The crucial factor is that as schools attempt revision, we must not only envision change, challenge change, develop a rationale for change, plan for change, organize for change, and implement change, but the total innovation program MUST provide for process and product evaluation. Without it the schools will never improve, and thus will never reach the goal of this book, to have successfully implemented different kinds of schools in the belief that these different approaches will lead to better schools.

SECTION C

HOW GUIDELINE RECIPES ACHIEVE OPTIONAL PATTERNS

Chapter 8

Planning For Change

Sections A and B tried to explain why schools must change and what current revisions might be immediately available to most districts. The chapters which follow in Section C are designed to describe how retooling is accomplished. None of the suggestions are theory; all have been used in practical school situations.

It might appear that some of the ideas border on speculation, and a few chapters such as this one on planning and the next on how to start may almost seem to belong in Section B--theory, not practical. However, they are intended to provide a transition from the why and what to the how; further, they are essential in that the school must have a general concept of the process the staff intends to follow to achieve the goals sought; the leadership must understand what it takes to get started. The ideas presented in this chapter and Chapter 9, as well as all the others in this section, are those used to develop "innovative" schools in several states. Thus these are exactly the steps taken by some educators to achieve the desired new programs in actual public school situations; the heart of these procedures is long range planning. For example, how many schools now have a mechanism to insure ongoing change and innovation? If we are to develop better schools, there must be a planned process for change.

Before presenting ten specific steps which any staff can follow, a few generalizations may be of value. One of the broad statements which is easy to defend is that schools must develop a recycling process if change is to become a constant never ending growth pattern. Part of this recycling calls for the staff to make sure that as individuals and as a staff they have done some dreaming--that they have really envisioned possible changes and that they have challenged the current status of both "conventional" and "innovative" schools--and their own situation. Each person must ask, "Are we really dissatisfied with present programs? Aren't schools doing a good job? Are the innovative schools any better?" If this creates discontent, the staff must then wrestle with a rationale for change. If the search produces more go power, the staff should next plan some tentative blueprints. Planning leads to organizing for change; the staff and structure must be redeployed to provide mechanics for accomplishing the objectives.

If the staff has envisioned, challenged, philosophized, planned, and organized, then the group should be at the stage where they are actually ready to create the changes agreed upon during the pattern suggested above. After actually achieving the new approaches, there must be a willingness to evaluate--to ask the questions of whether the school really is significantly better. The task is not yet completed, as then the staff must reflect on all that has happened and ask themselves if they are content with their present programs. Generally, the excellent staff has put together a school that is better, but they also realize that there is room for further improvement.

This leads them right back to the original notion of envisioning what further revisions might occur, and from these to challenging, planning, organizing, and evaluating their programs again and again. This is the way to insure that a school constantly is at the top of the best schools list. Unless a staff is prepared to cycle and recycle through constant change and evaluation, the program soon becomes stagnant. The adults develop an attitude of we are among the best

and some become smug and harder to change than the "traditional" school. Many of the innovative schools of the 60's reached a peak and were listed in the "top 10," but as the 70's begin, they are no longer among the pioneer schools. A major problem now is to not only convince a staff and community that change is necessary, but also that there must be a permanent change process--and this is a mechanism few schools have.

Many educators have been saying for a number of years that most of the schools are obsolete; across the nation, the present school which exists in the great majority of communities must go the way of the dinosaur. Almost every day we can look at newspapers, magazines, or booklists and find articles or publications on the need for revision in the schools. The major issue now has become, how do you plan and achieve this goal?

Fortunately, many inventive educators have been joined by visionary social and behavioral scientists; within the past ten years an increasing cadre of "change agents" have been saying the same thing: schools must change. The seeds of dissatisfaction with present efforts are being well sown; the great task is to replace the obsolete programs, procedures, and buildings with concepts which are dramatically new in education. The only real quarrels revolve around the questions of what is better and how can any agreed upon recommendations be implemented.

One of the most important of these new concepts says that "if schools are to be significantly better, they must be significantly different." If we adopt this conviction, the question then becomes, "How can we do it?" What are the mechanisms for achieving change? Unfortunately, we have no real mechanism for planning change in education at present. Successful educators are often not able to tell others how they were able to bring about a particular change. However, we do now know a few things and are learning others; we know that once we start we must involve the staff, we must evaluate, and we must build provisions for on-going or continuous innovation.

In order to discover additional information about how to change and what is better, more and more schools are needed as beacons for innovation and improvement. We must have exemplary programs. Some schools must lead the way. Most of the change that has taken place thus far has been in the suburban schools. Very little has happened in the rural and urban areas. However, now the social pressures and the possibilities of civil strife are forcing renewal in urban situations. But as of yet very little of immediate consequence has occurred in the rural areas or in the overwhelming majority of all the schools throughout the United States. A few projects have been attempted and fortunately some cities and some states are now getting involved in long range planning, seeking solutions to suburban, urban, and rural dilemmas.

As this new effort to plan for change gets underway, we need to understand the role of the local leadership. We must realize that some of the local leaders must become R and D men--they must involve themselves in research and development. Others need to be inventors in education; many need to be adopters. Title III and other foundation funds have presented opportunities for dreamers to invent new situations and for research and development to occur. Once these solutions are presented, the ideas must be diffused with zeal by their advocates.

These missionary type leaders are still seeking to understand the mechanics for spreading new ideas. In the past educators have only been involved in dissemination. We have told people about a new idea but very few listened and thus little occurred in the school. We need a commitment from some schools to

demonstrate--to actually try the idea rather than just talk about it. At the end of this diffusion process, other school leaders must say, "We would like to try that." Then we get to the third role of some of the local leadership, that of adoption. Once the decision is made to adopt a new idea, the local leadership must see that the materials are analyzed and evaluated and some determination made as to whether or not the program is successful enough to pursue further, either in its present or in a modified form.

During the following discussion of planning for change, many of the mechanical facets will be considered. But change agents should remember that the focus of change--the real reasons for planning for change--revolve around the individual student and individualized learning. We are interested in the universality of education, where all boys and girls receive a better program regardless of ability, interests, needs, religion, color, geographical location, or any other factor. American education must begin to focus on the individual, not the group.

In planning for change, we must realize that if we attack people, generally we will not be particularly successful. People become rather defensive when they are told they are doing a terrible job or they need to improve, but we can bring about the same change by attacking the components of the educational system rather than the people involved. In other words, if we can say to the person, "If we could only develop a way of doing this differently, just think how much more we might be able to help these students." People will usually listen to attacks on the components and sometimes accept the notion that maybe they should consider changing some educational practices, but they generally reject personal attacks.

If change is to occur, consideration must be given to revision of each of the six components of that school. We certainly must change the learning environment. Unfortunately, in most schools we still place students in a room with 30 desks facing a blackboard. If we are to make significant alterations, such as the abandonment of the single textbook, the adoption of multi-media resources, the elimination of the old 55 minute bus schedule, the replacement of the self-contained classroom with team teaching centers, and the use of technological systems, we must develop a mechanism which will offer some hope of rapid and successful revision. Ironically some of the "big" changes can occur faster and easier than some of those thought of as "little" changes; some revisions can be very effectively and successfully made on the "spur of the moment"; others need long, painstaking consideration.

There is presently no magic way to achieve change. The ten guidelines suggested below for planning and effecting improvements in individual schools are not exhaustive nor necessarily original, nor do they ensure success. However, they have proven to be of great value in a number of practical school situations. If we are going to change attitudes and directions and components of the present schools, perhaps the ten steps listed might be considered in the present order. These ten considerations were originally suggested in Volume 3 of the Designing Education for the Future publication, Planning and Effecting Needed Changes in Education, now printed by Citation Press. Though modified and revised, they have stood the test of time and success in many schools the past several years.

The FIRST and most important step or guideline is that of developing committed leadership. Most schools generally reflect the principal. The result is that many schools are rather dull and unimaginative because their administrators fit that description. The training of administrators through the university and/or

district in-service programs is obsolete. The methods usually develop leaders who are basically afraid to venture from the time worn path. The intern program of the National Association of Secondary School Administrators was an attempt to change this process. The principal of a school must accept that his primary responsibility is that of achieving change when change is synonymous with improvement. The great educational leaders are like orchestra leaders: they turn their backs to the crowd.

Many principals are actually against change. Some are wondering whether they should even try to get ready for change; presently they are still sitting on the fence. Other administrators are actually deeply involved. Perhaps the description of innovators as stated by Everett Rodgers of Michigan State is rather appropriate here. "Innovators are venturesome individuals . . . they are generally young . . . they are cosmopolite . . . they spread new ideas as their gospel . . . they are likely to be viewed as deviants by their peers . . . they are in step with a different drummer . . . they march to different music." No school has a chance to make the contemplated change successful if it does not have committed leadership; it goes beyond the principal, too; there must be a core of excited innovative teachers who want the program to succeed; they must be just as much or even more committed than the principal; the administrator cannot achieve successful change without this committed leadership at the teacher level too.

The SECOND suggestion or step in the planning process is to review the literature. This is not just another academic college exercise, but has become quite essential. At the end of this book is a bibliography which merely gets at some of the writing on change; it in no way attempts to cover the growing amount of material on the change process. Much of the best information now available is still in the form of speeches, mimeographed statements, dittoed copies of someone's ideas, experimental project reports, or magazine articles. None of these types have been listed, but instead merely a few of the books discussing the need for change, the change process itself, and ways of successfully implementing specific programs. In order to achieve planned change in a school, the committed leaders must read the literature. Part of this reading relates to the inventing literature--how to implement the change--how to get acceptance of the idea of individualized instruction, for example--the real change process in action.

If more administrators would read the literature they could avoid many pitfalls. In the past, reports of value have come from the Cooperative Projects of Educational Development, from the Ohio State Theory into practice Newsletters, from the attempted National Institute for the Study of Educational Change, from the Institute for the Development of Educational Activities, and from the Designing Education For The Future Projects. Although none are going strong now, the material produced by their organizations are among the significant publications regarding planning for successful change. Even now, though, these efforts are becoming obsolete as many writers and groups have undertaken the task of seeking answers to the problem of retooling. New organizations and new writers are producing more advanced reports. But part of the solution still seems to indicate that schools need to identify committed leaders at the administrator, teacher, and student levels; these leaders must read the literature. After accomplishing these two tasks, schools then appear to be ready for the next step in implementing a specific change.

That THIRD suggestion is for the school to evolve a philosophy. What is going to be important for boys and girls in the year 2000? Will this change or these

changes be defensible in terms of basic beliefs? These questions are not an academic exercise but are crucial to the successful planning for change. The school needs a working paper in a constant stage of revision, but one which at a given moment in time can be referred to by a staff when trying to reach a decision about adopting a change in the school.

This philosophy ought to be rather specific--no more than two or three pages. It should relate what the teachers really believe about students, about learning, and about education in a rapidly changing society. Comments on self-direction, self education, multiple personalities, goals of the learner, motivation, appropriate tasks, open-endedness, creativity, positive self-image, success each day, diagnosis/prescription/alternatives, individualized instruction, continuous progress, and responsibility must be fairly well spelled out and agreed to by the staff. A rough working copy of one such effort by a staff is presented here. It still needs revision and much of it should be stated behaviorally, but it may serve as a rough sample and thus help schools make a practical start.

The additional "14 points" which are attached to the philosophy statement became the first revision for this school. The staff felt a need to explain in more detail the draft presented here before writing a new one. After two years this still stands as a daily workable model which is constantly referred to when differences of opinion and policy develop at the school.

Tentative Working STATEMENT OF SCHOOL PHILOSOPHY

I. Purpose

- A. The school serves persons and groups by helping each one to understand and to respect themselves, other people, and their world, by becoming responsible, decision making, self-directing, value judging, self-educating individuals.
- B. The school is to benefit education as a whole through innovation, experimentation, research, evaluation, and dissemination of many new programs. To this end conventional methods should continue only where they really appear to be best for certain individual students; this school should be one of those probing the future.
- C. As part of the experimental nature of the program, the school provides a laboratory setting for pre-service and in-service training of teachers and administrators in cooperation with schools of education, especially aiding new designs in teacher education.

II. Beliefs: Stated beliefs are based upon present knowledge and understanding of growth and learning; they may change as future research changes that knowledge.

A. The Student:

- 1. All students are different and have different capabilities, needs, and interests which change from day to day even within the same student.
- 2. Anything taught and any method used to teach it should be appropriate to the student's capabilities and relevant to his needs and interests

- at the particular time, rather than be only continual preparation for the next step in his education.
3. Every student should find some success every day; the school must utilize every person, method, and material possible to give him a greater chance for success.
 4. Because factual knowledge changes and multiplies so rapidly, emphasis should be placed on process and inquiry rather than on product and content. The student should be encouraged to enjoy learning, to be receptive to change, and to educate himself.
 5. The student should be encouraged to learn how to ask questions, find answers, organize his information, and draw generalizations from his information.
 6. Each student should have the necessary freedom in which to direct his own behavior, make his own decisions, and form his own values. Through this freedom he can develop respect both for his own worth and unique qualities and the rights of others.
 7. With this freedom, the student must be taught to accept responsibility for the results of his behavior and decisions. A situation in which the student disciplines himself is most conducive to learning.
 8. The emphasis in both teaching and learning should be on human relations, tolerance, and understanding rather than on content and skills, though these are also necessary. "The goal of the school program is to help him develop an inner self capable of finding solutions."

B. Learning:

1. In order to learn, each student must consider himself capable of learning and worthy of being taught.
2. The student must be interested in what he is studying and motivated to learn; the most effective motivation comes from within the student and occurs when he sees the relevance of what he is learning to his own goals.
3. The student learns best when he is trusted, when his ideas are respected, and when his learning behavior is reinforced. Negative criticism and failure lead to discouragement and further failure.
4. Creativity is encouraged when the student feels free to question everything, when divergent thinking is rewarded and when thought and imagination are the goals of factual information and memory.

C. The School:

1. Persons affected by a decision (students, parents, teachers, and administrators) should have a part in making that decision.
2. Curriculum should not be rigid, either for all students or for all time. Continuous evaluation of the curriculum should provide for continual change as the individual student and situation change.
3. Teachers must work and plan together in order to personalize each student's program, unify the curriculum, and give the student the benefit of multiple personalities. Time must be made available for this cooperative planning.
4. The schedule must be sufficiently flexible to allow a variety of groupings, time patterns, and uses of resources.
5. The school should, whenever possible, respond to and encourage students and teachers rather than restrict them.

D. Resources;

1. The future education requires a wise, knowledgeable empathetic teacher.
2. All available human resources should be utilized in the most effective way possible to expand and enrich the student's education. To this end, specialists should delegate their non-specialized functions to others; teachers and counselors should not be wasted in clerical duties.
3. Materials of all kinds must be provided, or developed if they are not otherwise available, for students of all abilities and at all levels.
4. Multi-sensory materials should be used to reinforce learning and to provide every possible chance to reach each individual student.
5. Teachers must be aware of all new technological and psychological developments which could be utilized in education and must evaluate the results of their use.

Additional 14 Points statements of school policy

1. A major element of importance in the program is the teacher-pupil match--a child may choose any teacher (whenever possible) on the team in an attempt to find that match--we know that personality/perception/interest/sex/age/skill of consultants make a difference; the students also need to realize that it is possible to choose a teacher other than the customary one formally assigned.
2. The affective domain is most important--self-image, success, attitude toward learning; the psychomotor is second--gross motor, fine motor, visual motor, auditory discrimination. After both these areas are in good shape, the cognitive comes easily, if the curriculum is individually paced. Then all those areas should develop concurrently, working on anywhere difficulty arises at a later time. Sometimes, though, the cognitive can be a key to improve the affective.
3. There is no such thing as a grade level. Consultants must stop referring to 6th grade math or 2nd grade reading. Students should be referred to only as individuals or in temporary groups--the drug group, the astrology group. In a nongraded continuous progress program, comparison of a student with another or with a fictitious group norm cannot be used to equate progress; these comparisons have validity only in individual diagnosis and prescription.
4. Each consultant must know each of his students thoroughly in relation to the student's progress in his area. Consultants in various teams must meet frequently to discuss students.
5. Each advisor is responsible for knowing each of his advisees in all areas--the affective, psychomotor, and cognitive--as related to all study experiences, involvement, and other phases of school life. Each advisor is responsible for checking the progress of each of his advisees every few weeks and for seeing that additional help is sought from counselors, psychologists, administrators, parents, other staff, and outside professional help if a student has a problem. We do not expect to be able to solve every problem, but the advisor is responsible for seeing that each advisee has a program aimed at overcoming his difficulty--realizing that the program may or may not be successful at that moment in time; continuous program review is necessary.

- a. Each consultant is to send each advisor a number of reports each year concerning that work of the student; the advisor is responsible for completing the yearly evaluation report for each advisee and for cleaning out or catching up each file--following procedure recommended by the counseling team.
 - b. Each advisor must communicate with the parents, following procedures set up by a faculty committee. In general, the parents should realize that if we do not contact them, the student is progressing; in the meantime, the parent may contact the school if he feels it is necessary.
6. Each learning situation is generally to operate in five phases--much 1-1, open lab, and independent study, with small and large groups as needed. There should be no problem of grouping; if some students want to meet in a group, or some teachers see value in a group, groups can be arranged.
 7. The best possible curricula is usually student developed; but, if necessary, some portions of an individual student's program may be prescribed for him. Optional attendance is still the general policy; however, an individual student can be required to come to a particular learning situation if it has been agreed upon by the student, a group of teachers, parents, and advisor.
 8. All former so called "allied" curricular activities--such as dances, clubs, athletics--are considered part of a student's learning activities as well as part of a teacher's contract. Plans for activities which take place outside the usual school procedures should be discussed with the associate director in charge of student programs. All students shall be eligible for activities unless a faculty group has reason to prescribe exceptions.
 9. The Student/Parent/Faculty Advisory councils can submit requests directly to the Board of Directors if the request seems to affect only that group. Where the requests obviously affect another group as well, they must go through the Joint Council by way of the associate director in charge of community services.
 10. Students must be heavily involved in school development if the school is to be successful. Faculty are encouraged to encourage student participation--including younger students--in formulating school improvements and policies.
 11. Faculty members must learn to function as team members in practice as well as in theory. Four people working, teaching, and communicating together about a group of kids can do a better job than four individuals who refuse to work together--that is, to discuss curricula, student progress, and problems and reach a mutually beneficial solution. Student interns are members of this team. For example, there are not two industrial arts teachers, there are four; thus, how can four help 200 kids, not how can two with some assistance help 200. This means student interns must make quality efforts.
 12. There are "stop signs" at school. Kids do not have complete freedom--there are restrictions. But those restrictions are similar to the few imposed when one has a driver's license--speed limits, stop signs, road courtesies. Teachers should be no more restrictive than these few simple requests indicate; but they should be restrictive, as the policeman is, when there are violations.

13. Teachers need to be aware of media center/library facilities when building curricula, and need to be aware that some students learn better through auditory and visual methods.
14. This is a 12-month continuous progress school. Students should be able to plug in, plug out, speed up, slow down, start, stop courses at any time, and take as long as desired for the study.

Before writing the tentative draft, and when constructing the additional 14 points, the school leaned heavily on statements about learning which were published in the 1959, ASCD pamphlet, Learning More About Learning. These assumptions are listed here as a further guide for students and staff to consider in developing a statement of school philosophy.

1. Learning is a problem of the total personality.
2. Learning is a problem of an individual's personal discovery of meaning.
3. To teach a person we must understand him. This is more easily accomplished by trying to see him and his work as he sees them.
4. Education must start with problems that are important and need-relevant to them.
5. Since needs, values, and attitudes are such important determiners of perception, education must seek to help students know what needs, values, and attitudes are important to them and to consider these fully and in relation to each other.
6. Since personal perceptions are not readily changed through the introduction of objective evidence, education must begin with the beliefs of students and relate knowledge to their peculiar perceptions.
7. Perceptions are most readily changed through a re-examination of needs, values, attitudes, and the possible meanings of previous experience.
8. Knowledge is but one determiner of human behavior.
9. Learners learn in response to their needs and perceptions, not those of their teachers.
10. Education must start where the child is and permit him to determine his own direction and pace.
11. Not specific behavior but adequacy of perception and openness to experience should be the goals of education.

The FOURTH step or suggestion in changing a school is to create a dissatisfaction. Assuming that the philosophy that has been written indicates other than those now being reached are part of the goals of the school, the faculty and students must begin to challenge themselves: "If we are not meeting the goals and objectives, why aren't we? Could we find a better way to do it?" This questioning begins to develop a dissatisfaction with the inappropriate programs currently in operation in the school. When we look at the fact that almost one-third drop out of school on their first attempt at a high school diploma, that another one-third can be classified as in-school dropouts, and that only one-third go to college, it becomes rather obvious that if the philosophy reflects the type of thinking presented in this book then certainly the present schools are not satisfactory and ought to undergo rapid change.

The FIFTH suggestion or step is to overcome the barriers. If there are problems preventing the implementation of successful programs which would enable the school to reach its objectives, then those barriers must be identified and removed. Some of the barriers can be attributed to school superintendents, some to college professors, to state departments, to boards of education, to parents, to teachers,

and to students. In other words, there are many reasons why schools have had and do have barriers to improvement.

In identifying these impediments to progress, it becomes obvious that many are caused by educators. For example, we as a profession have believed that if we could have 25 students in a class, that would be the optimum size, and that with this enrollment students could learn better, in spite of the fact that there is no research to validate this notion. We have said that if we could have one teacher with this class, and that if this class and this one teacher could meet daily for the equivalent of 275 minutes a week at the high school level, or for the equivalent of 25 hours on the elementary level, then we would have successful schools, and boys and girls would get a good education.

In high school we have spent time arguing whether seven periods or six periods are better for the learning process, when the truth of the matter was and is that neither one of them has any reason for existence. We have said that if a teacher has a free period, she is a better teacher. We have said that if a teacher has 18 semester hours of those wonderful education courses and then 18 more semester hours in subject areas, these 36 hours would make her qualified to teach. We do not certify someone who has only 17 3/4 hours in education. We have counted the number of books in the library, and in spite of the fact that very few of the schools have met the standards as set by the American Library Association, we still try to say that books in the library indicate quality. These are examples of barriers that we have to overcome.

Guideline SIX indicates that after identifying the barriers to change, one way of overcoming these impediments is to arrange for models. In other words, the teacher must sometimes see a model or hear about an idea in order to recognize the manner in which the notion might be accomplished in their school before they are ready to try something new.

One model to set up in a school could be called the rational model. Some teachers are willing to change by reading about it. In other words, a teacher picks up a book on non-grading and while reading it says, "This makes sense to me; I'd like to try it." Some are sold by this kind of model. A second type of teacher is sometimes sold by what could be called the sales model. The outside consultant comes in, gives a large group presentation, meets with teachers in small groups, has a dynamic sales personality, and convinces a teacher to go ahead and get started on a new idea. A third type is the demonstration model. Some teachers just will not change without actually seeing it in operation. Therefore, for these teachers, trips need to be arranged for them to see the program in operation. A fourth type of model that can be established is what is called the money model. Not being sure the proposal will actually work, but having money available to make the attempt is one way of getting some involved in innovation who might not otherwise try. This is risk money; the teachers feel they have nothing to lose and much to gain. In changing a school, all of these models and more need to be used.

For example, in trying to change schools in the Lake Region of South Dakota from 1967 to 1969, the Title III Regional Center set up the Innovative Schools Project where teachers attempted various new innovations; then they visited each other to discuss the change and decide whether or not they wanted them in their particular school. The districts in the project were classified as operational, advanced planning, planning, and pre-planning, depending upon the stage of development they had reached in terms of successful implementation of the innovation. This regional concept to change provided immediate models for many teachers to see and discuss.

Other regions are taking a page from the county extension agent; universities and colleges and public schools are joining together in a cooperative effort; sometimes five districts combine efforts in innovation by pooling part of their financial and personnel resources. Much more can often be accomplished by cooperative efforts than if each of the five districts tries to go it alone. There is no need, for example, in many areas, for all five districts to try to buy a computer; they might lease one cooperatively and all five share in its services and potential.

Suggestion SEVEN is to consider the budget. After a staff has determined it has the committed leadership for the proposed change (1), after the staff has read the literature about the change and how to implement it (2), after determining that the change fits the stated philosophy of the school (3), after becoming dissatisfied enough with the present program to desire a revision (4), after identifying the barriers previously preventing a different program (5), and finally, after considering various models as to how the proposed change might be developed (6), the staff is now ready to carefully review the budget (7), and look at the cost of the proposed change, to see whether the time and financing seem worth the potential improvement.

Some of the changes are going to cost more money. In-service workshops, new media centers, technological developments, new facilities, and acoustical flooring all cost money. In most of the early innovation projects around the nation, Ford, Kettering, Carnegie, Rockefeller, Danforth, or federal funds from ESSEA provided the impetus to change. But regardless of how much money is available, Plan A eventually has to equal Plan B, because there is only a certain sum, no matter whether a traditional or innovative program is attempted. Further, much of the money being spent now under the guise of change should be spent in the traditional program. A library is not new, yet few schools have an adequate one--especially considering the media center concept; thus in many instances we are merely "catching up" to where we should have been long ago.

Actually, the key in considering the budget is to realize that with a little imagination a great deal can be done on exactly the same budget most school districts now have. For example, rather than hire two first grade and two second grade teachers and give them four self-contained rooms, for the same amount of money and in the same space, three teachers can be hired along with three teacher aides. A wall can be removed rather inexpensively, and these teachers and their aides can team teach, team plan, build daily variable flexible schedules or daily smorgasbord schedules, can utilize large and small group instruction, independent study, continuous progress, self-pacing, responsibility, self-direction, and techniques of inquiry and discovery; they can become involved in new curriculum materials, and completely individualized instruction; all of these can be achieved for the same expense it would cost to run four traditional classrooms. One of the methods of change then involves a re-allocation of the budget and a little imagination. Many schools make the mistake of waiting until more money is available; much can be done with what we have.

Suggestion EIGHT is to select an alternative. Once the budget has been considered, there has to be a decision as to whether the entire school will become involved. In other words, will all the teachers and all the students be placed in the new program or would it be better to start with a third of the students and staff. Generally, in most schools about 30 per cent of the teachers are ready to go right now. About 40 per cent want to sit on the fence for a year or two, and about 30 per cent are against any change.

If the school is a new one built for improved education, and especially if a new staff is hired, the school should follow the 100 per cent approach and move immediately toward new directions in education. Even in older schools, if the principal has good staff support, generally the 100 per cent method can be used.

However, if only 30 per cent seem ready, then the school should start with that group of parents, teachers, and students who are ready for change. We usually make the mistake of waiting until we have a majority, and that is not necessary. Start with those who believe in change; it is not fair that they should be forced to teach or learn in a rigid school just because some want to and others are not sure. Let some stay rigid for awhile, but let the innovators innovate.

Tougher schools to change can be started by the so-called pilot project or the project method where perhaps two teachers in sophomore English work together in a small teaming project. This is much too slow and not recommended unless there is no better opportunity. In a few schools, it may be necessary to use the "no project" method. In this situation, a few "busy bees," so to speak, begin discussing new ideas among the faculty over a cup of coffee. If it is necessary to start at that point, then start there; but do that rather than wait. Get them involved in discussing possible changes and develop their readiness to accept some of the concepts. Many of the basic ideas have already been tried often nationally so now we know that they will work if implemented properly. We can speed up the process of change by selecting an alternative that will lead where we are going faster and more effectively than if no course of action were planned at all.

Suggestion NINE is to provide for ongoing evaluation--as was emphasized in Chapter 7, but repeated here as one of the steps in planning. Innovators are generally now evaluators and probably should not be, but somebody must evaluate. As change occurs, methods of evaluating the program must be built into the system. There needs to be continuous short term (daily, weekly, monthly) evaluation as to present success and direction. There has to be evaluation at the end of a large period of time, such as after a year or several years. We must plan some type of determination as to whether or not the final product is indeed any better than what was being developed before. Many objective and subjective evaluation methods are now available to measure a number of the innovations, and the findings of many of the studies are beginning to show that most of the new concepts in education, when properly developed, do help provide a better program for the students.

Suggestion TEN is titled Sell-Implement-Sell. After proceeding through the first nine guidelines, the proposed change should now be ready to create and implement. Before implementation, though, there is the necessary job of making sure that through the process of decision making, the idea to be tried has been sold well enough to launch the project. For example, if the staff wants to begin flexible scheduling, they must be sure that enough of the school board and central office and parents and students are convinced that this would be a worthy endeavor if the project is to be a success. This is why having optional choices for parents and teachers and students is best--go there if you want a traditional program, or here if you prefer the new type.

Once the final decision is made, the staff must begin to implement the practice or practices created in a more or less step-by-step process by observing the ten suggestions just described.

The second sell in the title refers to the fact that even after implementation is under way, there must be a continuous effort to sell the idea that the experiment is successful and certainly worth continuing and that there should not be too much concern over some of the problems that possibly have developed. These problems are to be expected. Of course, if the experiment does not seem to be a better approach, the school may want to drop it. However, generally, if the idea is sound in the first place and has been well planned, then if the experiment does not succeed, it is usually not because the experiment itself is not worthwhile, but most often because of bugs in the creation or faulty implementation. Perhaps at that stage the staff will want to revise their ideas and their methods of implementation and re-evaluate what they have done thus far. It may be most appropriate to try again in a more polished manner. It takes two to three years to successfully implement massive change.

One of the most important factors in selling the idea of innovation to the community is to "brainwash" students into sales ambassadors. The best salesmen for a new program are the students. If they like the program, are excited about it, and it makes sense to them, generally the program will be successful. The parents will buy almost anything if the students like it. However, if the students aren't happy and are dissatisfied with the program, the school is in trouble immediately. Many schools make the mistake of trying to implement by just announcing to the students that this is going to be the new program. The students must be an integral part of the planning, they must understand why; there must be a great deal of discussion and understanding; the students must become firm believers themselves and carry the message. They more than the teachers, in the initial stages, will determine the success of the program.

Specific steps that might be taken during the sell-implement-sell stage are suggested: (1) an explanation to the staff as to what total program might emerge; this can be accomplished through a series of large group, small group, independent study, and individual conference techniques; (2) it can be explained to larger groups of parents and students; assuming that small groups of parents and students have been involved in the initial planning and explanations to the staff; (3) then start the program; (4) continue to sell the general student body and staff and reinforce the idea that what is going on is all right; (5) explain the program again to all the involved groups in various types of large, small, and individual presentations; (6) lock the door and remove the phone. No matter how careful the effort has been to involve the staff, parents, and students, and to explain and let them ask questions and become committed, it can be expected that there will be a group that will be anti the attempt or frustrated at certain stages of the innovation effort. If the phone is on the hook so that it can ring, the school will be constantly bombarded; here is another reason not to sit in the typical administrator's office. Those responsible for the change will hear, "We do not like the program, we do not understand it, we want you to stop." However, the real test of the program and when the school can tell it probably will be successful is when phone calls begin where the parents say, "I still do not understand it, may not like it, and do not want you to sell doughnuts; but go ahead and do it. The kids love school, and how can I argue with success."

The key to student support is STUDENT INVOLVEMENT; they must understand why these changes; they must also comprehend the concept that WITH FREEDOM GOES RESPONSIBILITY AND COURTESY. The students must understand, for example, why they are being given a schedule that varies from day to day and why this schedule is going to leave them large blocks of open time where they are going to schedule themselves. During this

unscheduled time, they must understand their opportunities. They should realize that they can choose a hot dog, the library-media center, or a classroom, or about 20 other places around the school. They must understand, when they choose to go to a spot, what possibilities are there. They must agree not to eat doughnuts in the media center but instead in the student center. These are the kinds of understandings the students must have clearly in mind to make daily scheduling, for example, a success. If they can see that their present schedule does not provide these opportunities, they will quickly become dissatisfied and ready to consider the new program.

In further preparing them for the new program and as part of an ongoing process, there should be several student-faculty teams. There can be a student-faculty team for curriculum, another for ideas, another for communication, and another for evaluation. In other words, there may be ten students, four faculty members and one administrator on a team for curriculum. These students leave school from time to time with several teachers and administrators; the fifteen of them can sit down in a conference room at a restaurant spending from 9 until 12 discussing the various curricula, problems, need for revisions, and the type of program the school ought to have. From 12 to 1 they have lunch in the restaurant; from 1 to 4 they continue their discussion. It is a most exciting process to see students and faculty operating on a one-to-one basis in this kind of interaction. Each member of the committee, students and faculty alike, have one vote. When suggestions are finally made and brought to a vote, this vote is recorded and submitted to the administration as a recommendation.

Another team considers new ideas in general. There should be a group of students and faculty who spend time thinking--just brain storming for ways that the present school can be made a better school. There ought to be a team for communication so that student problems can be brought to the faculty and administration, and conversely faculty and administration problems brought to the students. Finally, there ought to be a team for evaluation. The students and faculty involved should draw up surveys and questionnaires of various kinds and submit them to parents, fellow students, and faculty members to determine how the program is regarded and what might be improved. This whole philosophy, this whole concept, is built around the notion that with freedom goes responsibility. Students must be heavily involved with the faculty in the decision making process of the school.

To follow these ten planning suggestions with any degree of success, there must be supportive efforts. For example, the parents in both small and large groups must work with the teachers and administrators to communicate the ideas that are being planned or developed. Consultant service must be provided. In-service training for teachers is not a luxury, but a necessity. The teachers must have planning time, and the planning time must come during the school day; it cannot be done at 5 o'clock at night or on Sunday afternoon.

Another type of supportive effort that must be provided by the administration is travel. Teachers should be allowed to visit programs in operation. The state department must become involved. For example, suppose a school wanted to try optional attendance. Most state departments would say, "Oh no, you cannot do that." We need state department leaders who will say, "Sure, that sounds like a good idea to us, go ahead and try it. We will help you evaluate." Teachers should have days off from school where they are paid to do nothing but think. This is not heresy, is not impossible, and does not require extra budget; this is feasible. We have done it in a number of schools. Educators need to be paid

to spend some time thinking; studies in industry show that think days produce dividends.

The board, superintendent, school leadership, staff must be supportive of the philosophy. For example, right now in most of the elementary school districts, attendance is determined by chance of address. Little Mary lives on the north side of Fifth Avenue. She must go to the Red School; but if little Sally lives on the south side of Fifth Avenue, she must go to the Blue School. We let a few feet of real estate decide a child's education. This is absolutely ridiculous; it is contrary to all philosophical statements regarding individual differences of students and for developing a program based on the needs of individuals. It is quite possible that Mary, who must go to the Red School, would be better off in the Blue School; and it is quite possible that Sally, who must go to the Blue School, would be better in the Red School. There must be other methods devised to allow students to be more selective of the kind of school that is the most appropriate for their needs. Schools should be established with a very specific philosophy, and then parents and students should be invited to become involved in this school as one of a volunteer enrollment on the basis of commitment to the philosophy of the school.

Part of this supportive effort involves admitting failure. If the attempt to change was a sincere effort to improve and if the attempt by chance does fail, then there is nothing wrong with saying, "We tried it and were sincere; we thought it would be better, but it was not. Therefore, we are going to drop it and either go back to what we were doing before or try a different plan that hopefully might be better."

If a staff is sincere about its attempt to change in terms of improving what might happen to boys and girls, then change must be implemented rapidly. The staff cannot take three years to accomplish something that might be done in three months. In doing it in three months, problems develop that often do not appear if created over a three-year period. On the other hand, if the staff has a philosophy that the program needs improving and needs it now, and they cannot wait three years, then they must move rapidly. They may make mistakes during this time, but these must be expected, accepted, and dealt with as they occur.

What are the implications for the future? Why must we plan for change? We have said there are at least 69 or more revisions occurring in schools today. These revisions demand new philosophies; they demand a courage not usually found in most American educators.

It has been suggested that in order to achieve the school being advocated in this book, the ten steps outlined in this chapter related to planning for all the changes can be of value to the educators trying to develop a new kind of school. No school has reached the goal yet. No public or parochial school in North America is the kind envisioned in this book.

What we are looking for are innovative educators committed to a vision of and a search for significantly different and better kinds of schools. The timid at this point will shy away. Those with courage will continue to search, committed to a philosophy that "maybe tomorrow education will be better."

We can perhaps summarize this chapter on planning for change by indicating that the creation and implementation of new programs cannot wait for perfection. The

important factor in this entire chapter is that many educators now believe we can plan for and achieve the implementation of better schools if we are creative and devise a mechanism for the particular situation. We are on the threshold of a great adventure in education. Plans are needed today for achieving the kinds of educational programs that we now know are possible. We can develop that educational moon rocket.

Chapter 9

How To Start

These pages on how to start are not at all intended to be theoretical; there are some elements which may seem like broad generalizations; however when the specific comments are individually analyzed, it should be clear that these form the base of any real practical change in schools. The comments here will lay the ground work, while those in the chapters following will attempt to give more detailed guidelines as to how to implement the 69 elements of change listed in the glossary. It would take 69 books or at least 69 chapters to give "all the answers," and then many of them would only be temporary or only fit some schools. All 69 are touched upon somewhere in this book, but only a handful are spelled out in much detail. As this chapter should make clear, cookbook recipes in schools are of limited value, but the concepts and illustrations should make it possible for creative educators to create more humane schools.

In the past two decades there has been an increasing amount of soul searching going on in the hearts and minds of educators and the public in general as to the effect of the public schools. More and more have become increasingly dissatisfied as they have challenged the status quo. Generally a commitment is growing that the conventional schools could not be much worse when compared with what we should and could be doing in a nation with the knowledge and resources to put man on the moon. If the educators in a school are not really dissatisfied, successful change will not occur.

As has been previously stated, there is no guaranteed mechanism to achieve successful change in public schools. All that can be done is to list some guidelines which have been learned over the past 10-15 years. The Model Schools Project of the National Association of Secondary Schools is making progress; hopefully out of their experiences will come additional knowledge related to the process of change. Each of these efforts contributes to the basic questions: How does one accomplish rapid retooling? How does a school staff start?

There are now identified seven key ingredients to mix into the blend. These seven are presented, followed by some practical illustrations.

Guideline one: dissatisfaction--there must be discontent with the existing structure among at least the change oriented minority of the community (and there is this strong minority in almost every town in North America as related to the desire to revise the conventional schoolhouse); if everyone is satisfied with the status quo, no change will occur. Therefore, as a practical how to start message, be sure that the strong minority group wanting change has been identified and mobilized for supportive action.

Guideline two: commitment--there must be a belief that better schools can be developed. The staff must have confidence that they can accomplish the needed revision. There must be the fervor of the old-fashioned revival--they must really believe.

Guideline three: work--the staff which gets involved, and especially those who will provide the leadership, must be willing to work like they have never worked

before in schools--the first two years of massive reform are the hardest and do demand 26 hour days. For example, the author one week spent 122 hours physically in the building in starting one school. Arriving at work at 7 a.m. with no breakfast and staying until 2 or 3 a.m. with no lunch and only a minimal dinner were regular hours for several seven day weeks. One may ask if it is worth it. The trick is to get enough experience in the group that tasks can be decentralized. Then individual loads can be lightened, but regardless of the exact number of hours, the point that must be quite clear is that in developing a new program, long hard hours are demanded in the early stages.

Guideline four: creativity--there must be idea people who have the confidence that they can attack and solve the problems and frustrations when change is attempted in a community. Snags always develop in a new program. Usually the problem is not the idea or philosophy, but the method of implementation.

Guideline five: leadership--change does not need to cost more money, except for the catchup dollars to bring equipment, facilities, and staff for programs which have been neglected in the past or have not been previously implemented, but it does mean a reallocation of resources. In terms of personnel, it does mean that additional persons are needed at the decision making, implementation of change level. If a school has had two administrative personnel in the past, it usually means moving to four. This may or may not mean additions to the total staff, but the shifting of assignments must free additional help at the support team level.

Guideline six: paraprofessionals--more money is not necessarily the answer, but more adults are part of the need. By hiring six teachers instead of seven, immediately money is released to hire three or four paraprofessionals, making a staff of nine instead of seven.

Guideline seven: clerical/custodial--most educators starting schools have failed to provide adequate clerical and custodial help. New programs mean more typing, ditto sheets, explanations, record conversion, and all the rest. Further, the building is harder to keep clean, walls need remodeling, electrical outlets need installation, and a host of other such practical considerations. Custodians are among the most important staff members in the change process, but in most school districts they are the "forgotten man" when plans for change are implemented.

Now the task is to apply these guidelines to practical illustrations. They can be used to show how to change a district, or a school, or a room. Perhaps the best place to start is with some short, simple examples from a current school district. If the key words in education today are humaneness, options, alternatives, and relevancy, then it only makes sense that these would be the concepts that would determine the methods by which theory becomes practice.

To provide humane approaches, the district must have at least three types of programs. To start, then, the district can identify one elementary school as an open, flexible school and one as a more moderate team teaching but somewhat structured approach; the other schools can be left conventional while people have time to reflect. Obviously, the size of the district and the size of the schools cause variations in the format. A large district can identify several schools as open programs. Buses can criss-cross, car pools can be formed, and students can walk; this allows the one or more open schools to also be open attendance areas for the entire district rather than be a required neighborhood school.

The same can be done at the middle and high school buildings. Even better, one or more of the buildings can be converted to a K-12 program, an old country school-house under one roof. Does this theory work? Yes, look at one example of a town in 1970. All the elementary schools are pretty much self-contained conventional programs; the junior and senior highs are still quite rigid--bells, hall passes, required classes, and all the rest. In other words, the parents have a choice of sending their students to good structured neighborhood schools.

The middle-of-the-road schools at this time are provided by the parochial schools. Unfortunately, they have a tuition fee and some parents object to the religious affiliations, but they do provide a middle-of-the-road approach to change which should be available in the public schools. Until it is, the parochial schools do provide an alternative.

Then there is a open school sitting in the middle of the picture, a pre K-12 school offering a very flexible, optional program, such as is described in Chapter 3. There is no cost to the parent, nor is bus transportation provided. Attendance is open to anyone in the entire district. In other words, there are no neighborhood attendance lines for the school--only district boundaries; instead students, parents, and teachers volunteer for this program. The students and parents involved can check out at any moment--as soon as they are dissatisfied enough to move. Yet in this town labeled a conservative, midwestern farm community of 40,000, surrounded by a predominantly rural environment, this open school is full and each year has more applicants than it can handle. In fact, the biggest public relations problem has been to explain to some upset parents why the school cannot find room for their sons and daughters. Almost every community in America has parents and students who want open schools. The scene just described serves as a model for the nation.

Now, suppose there is only one school in the district in a small rural area, or that there is only one school in the district willing to change, or that the district is huge and all of its schools are so big that transporting students to a specific location would be difficult: how than can a start be achieved? The answer is quite simple: the school-within-a-school. If the high school has 2100 students, then one house of about 600 students can be established as an open high school. The middle house of 800 can be a modified open plan, while the remaining 700 can stay in a very structured program. Teachers, students, and parents can choose which alternative to education makes the most sense for them as individuals at this moment in time.

At the elementary level, a school of 900 could be divided into three schools of 300 each. When conflicts arise over shared facilities the first year, such as gymnasiums and other special areas, the flexible school sets up a flexible schedule to work around the structure. If an elementary school has twelve teachers, as an example, it can remain a neighborhood attendance area and still have an open and closed approach.

For example, seven teachers could form a self-contained K-6 room and school environment. Five other teachers volunteer to start an unstructured open program; they can be given five rooms at one end of the building and a few holes can be cut through walls. When one resigns, three paraprofessionals can be hired in his or her place. Thus four teachers and three aides, or seven adults, can take the same 150 students as would be assigned to five classrooms of 30 each, and in the five rooms develop a completely open nongraded, team taught, individualized program with emphasis on the affective and psychomotor domains; they can develop a

completely different program so that students and parents have a choice at no extra cost to the school district and no split in the community as to what kind of program to offer; the answer is easy; offer both! And then offer programs in between open and closed.

Now another challenging but exciting problem has developed in school districts which have already succeeded in developing open, semi-open, and closed volunteer schools within the system. A number of students, teachers, and parents in the open school are saying that they are not really "open" because state laws still require compulsory attendance, the school still worries about communication with the colleges, and some parents still prescribe math for their children even though the student does not want it at this moment in time. This group is now requesting a true "private free school" within the district where all volunteers really are willing to break the barriers.

In these "public Summerhills," the parents agree to put no pressure on the child regarding work or studying math; the teachers are not identified as art teachers or math teachers, but only adults working in any area they and the youngster want to share experiences. Records are not kept for colleges and attendance is not a concern. No schedule of any kind is built. These types of programs are available in limited numbers of private schools, but the concept of a truly open free school within the public system, where pressures of schedules, courses, and transfers are removed is a revolutionary breakthrough for public districts willing to try. Some students need this approach. Larger school districts can easily make small starts in these directions. During the 70's, the really great, humane school districts will not only have three kinds of schools--open, moderate, conventional--but will develop a free school to the left of the open program and probably another type of structure for the pre-state school youngster. These multiple alternatives are possible now; the person centered, humane educators of the 70's will provide for this type of revolution.

Unfortunately some leadership is still so weak in districts in America, that the district will not move to provide humane approaches, nor will a school take the step. What then can an individual teacher do? The answer is that the teacher can do almost the same program within the confines of the four walls all day or for 55 minutes in a secondary program, except that the teacher cannot do it as well alone as in conjunction with other staff and more flexible time and facilities organizations. But the teacher can pretty well individualize within each subject; he or she can interrelate curricula, can give large group presentations, hold small group conferences, provide for open labs and independent study and conduct one-to-one conferences or tutoring. A pharmacy of materials is needed, which can be gathered over a period of time; students need to learn self-selection of curricula. Parent volunteers can be enlisted to help with the young children, but much of what has been and will be presented in this book can be implemented by the adult in a single classroom.

Many individual teachers have used exciting creative approaches for years, but have been handicapped by the organization--the inhumaneness of conventional school districts. In the 1960's many schools began to break the old barriers--they were the pioneers for the schools of the 70's. It is possible to bring about immediate rapid revision in a school district or a school if the seven ingredients listed at the start of this chapter are given attention, if the idea of schools-within-a-school is adhered to, if enrollment is on a voluntary basis, and if humane leadership is available in the community.

If the leadership is there, change can even be accomplished on a regional or state level. Perhaps an illustration of the impact that can occur might be the dramatic change that many schools in the northeastern counties of South Dakota underwent in the late sixties. Even though the Title III centers have now closed and thus the regional and state leadership has slackened, education in South Dakota took a dramatic step forward; it is doubtful if it will ever return to the dormant role it once accepted. A particular nine month period in the history of South Dakota education might provide a case study of what can happen when leadership and go-power combine to develop humane approaches in education, and how it can falter without support.

As a generalized background to the philosophy that went into this South Dakota case study, the leaders in that area decided that some type of strategy had to be developed if all 69 "innovations" listed in the glossary chapter were to be implemented. They needed to define, as a starting point, the word innovation. For this project, the concept of innovation as "a new idea for a given area at a given moment in time" was accepted.

Further, the project needed to identify the problems and had to identify who decided what was a problem--whether the list came from teachers, administrators, students, parents, or outsiders. Some studies now seem to indicate that the innovation may be successful in the community if the solution has some importance to that society, if resources are available, and as the problem is tackled, whether there seems to be some probability of finding a satisfactory answer.

It was decided that if change and innovation were to be institutionalized, that the concerns of the people had to be solved. An analogy of concerns was presented by the pheasant in the South Dakota prairies; Mr. Pheasant read a sign which said "No Pheasant Hunting"; however, soon seeing a hunter come across the field, the pheasant ran; when asked why, the pheasant answered that he did not know if the sign was of concern to the hunter. The pheasant was concerned about his life; but what was the hunter concerned about at that moment? Was he hunting pheasants, looking for a rabbit, or just target shooting? Individual concerns, it was decided, had to be identified if change was to become successful. Hopefully, then, in reflecting upon the change movement in education which is presently attempting to gain headway in the United States, the project described below which occurred in the northeastern corner of South Dakota may give some insight as to how to start in a given district and as to the possibilities of achieving success.

The state of South Dakota, in terms of its educational system, up to 1967, had often been rated weak in almost all types of traditional educational evaluations. Yet how do we really judge whether a state like South Dakota has the poorest schools or the best schools? How do we know what is actually happening in the classrooms? How can we compare a high school in South Dakota with a high school in New York, or California, or Mississippi?

But these comparisons were continually made, and conventional ratings in the past did place South Dakota near the bottom. It ranked 49th in teachers' salaries. According to an article in April, 1967 Nation's Schools, it ranked 49th in the acceptance of innovations in education. It ranked 50th in support of higher education, and 50th in support of state aid to education. We could go on and on and mention the criteria which continued to say that South Dakota schools did not measure up. But whether they did or not, there was a commitment in South Dakota to improve the schools. Whether they were the best or the worst schools in the

country, or whether the movement continues or fades is not important here; the focus is that about 1967, the educational innovators in South Dakota began to say, "We must improve what we are doing, and we must improve right now."

In the first step in this direction, South Dakota's Title III funds were regionalized into four areas: the northeast area with a center at Watertown; the southeast area centered in Sioux Falls; the central area centered in Pierre; and the western region with headquarters in Rapid City. Each of these regions had the responsibility to help establish exemplary programs in their areas; they sought to help develop a philosophy which indicated a need for change and improvement; they sought to help schools implement better programs for boys and girls. There was a tremendous commitment to move South Dakota from a ranking of 49th, no matter how it might be evaluated, to a ranking of first. South Dakota wanted to become an exemplary state for improvement in rural United States. It wanted its schools to rank the best. But the problem was that not all South Dakotans felt this way. Many of the farm population still believed that schools were not terribly important, and that an eighth grade or high school education was enough, that teachers with two years of college were certainly sufficiently trained to instruct boys and girls, and that buildings that were built in the late 1800's and early 1900's were good enough because they were good enough for their grandfathers. Unfortunately, many of South Dakota's educational administrators and legislators were of the same philosophy.

The Title III groups in South Dakota reflected upon the plight of education as it existed and decided that if South Dakota was to move forward, several steps were needed. First, people had to be made aware of the need for improvement in the schools; second, they needed to be involved in discussions of how this might be done; third, there was a need to evaluate what was happening in the current schools, to take a closer look; fourth, there was a need to gain acceptance for some trial programs, to pilot some new ideas, to say, "all right, let us take a look at what this might mean and let's give it a chance"; fifth, there was a need to adopt some of the practices and put them into operation; sixth, after adoption, a plan was needed for reinforcement, to encourage and convince people that they were headed in the right direction; and seventh, there had to be evaluation to see if better schools were developing.

As we reflect upon what happened in South Dakota as a result of the regional programs, we see that the greatest progress was made among schools affiliated with the Lake Region Innovative School Project, the northeastern regional effort in Watertown; in one year, there developed a tremendous commitment to change, if change meant improvement. Communities in Brookings, Sisseton, Milbank, Watertown, Arlington, Waubay, Harmony Hill, Webster, and Huron to mention a few, began to commit themselves to change in their schools. Some moved ahead of others. The Brookings school system, for example, moved forward at a rapid pace. The Lincoln Learning Laboratory in Watertown became an exciting and different elementary school almost overnight. The Waubay and Sisseton Districts, and the Harmony Hill Parochial School in Watertown caused tremendous excitement and enthusiasm in a few short months by their commitment to new kinds of programs. None, however, developed the really open public free school; further, many of the schools in the Lake Region still have not begun to change, and as present leaders leave, there is no guarantee of a continuing effort. Within a year or two, the flame could flicker and die. The Lincoln Learning Center has already been closed as the originating leadership left without a built-in mechanism for survival. But the Lincoln ideas continue to influence those still in the region, and in the same community, Harmony Hill continues to flourish.

We often wonder how many ideas we reject in education without a hearing simply because experience patterns can recognize no parallel. The Lake Region Innovative School Project certainly calls for reflection, not only in terms of what was accomplished in a short period of time, but what the future might hold. Have these early efforts to change been in the right direction; will they make a significant difference in the lives of boys and girls? How do we continue to solidify and implement the programs that were started, so that in 3 or 4 or 5 years, areas like the Lake Region of South Dakota remain among the most exciting and exemplary educational efforts in the United States. The Lake Region, for example, had an excellent start toward leading the way for better kinds of schools in the rural areas of the United States. In one year, more outstanding consultants came to the Lake Region of South Dakota than probably any other single geographical area in the United States. It behooves every school administrator in that region of South Dakota to consider further innovation; the methods tried there might yet accomplish new directions and have a real impact upon national education; unfortunately, with the end of federal Title III control, the project schools are finding it difficult to maintain a high rate of innovation.

South Dakota is a good state to look at when reflecting upon the need for change and the mechanism for achieving revision. It vividly illustrates that change is possible, but also raises the question of how we can institutionalize on-going innovation, so that the brilliant starts made in several of the communities in the Lake Region do not fall by the wayside when the initial leadership moves on to other challenges.

The discussion of an attempt in South Dakota is pertinent to almost all states; most like South Dakota have had for many previous years a philosophy which said, "We would like to, we should, but - - - -," and then they proceed to list all the reasons why change was impossible in that state: no money, improper facilities, lack of equipment, lack of support in the community, and . . . and . . . and . . . But in 1967-68, the Lake Region of South Dakota began to adopt a new philosophy. They started saying, "We must make these changes; therefore, what are the steps, the procedures, and the priorities to accomplish this change? What are the short range plans? What are the long range plans? How can we make the schools of South Dakota among the best in the nation?" There must be reflection upon the number who have rejected change, as had been the case in the past in South Dakota, simply because educators' experience patterns were limited and their own frames of reference could find no method of achieving what were thought to be impossible dreams.

What South Dakota needs, what the Lake Region of South Dakota needs, what most schools or school districts or states in America need, is what we might classify as Continuous Project Innovation. We must find better ways to educate boys and girls in the schools. We must overcome the problems that we know exist. We can no longer accept excuses. We can no longer live with the notion that we would like to, but! We must accept the notion that change is needed, that change can occur, and that we can improve the schools. Experiences in school districts all over the United States, such as the author has had in Arizona, Missouri, South Dakota, and Minnesota all prove that rapid, immediate change can occur. Those districts accomplished fantastic revolutions in two years. The problem they face now is continuation of an on-going forever movement, or the revitalization of the efforts that faded away with a change in leadership or community factors.

As a means of starting, the concept of Project Innovation is feasible. For example, to achieve change, we need better cooperation between the universities and public schools. If the university in the region would sponsor one innovative project with

an elementary school, one with a middle school, and one with a high school, the potential for exciting accomplishment from this cooperative venture could lead to further change on a massive scale. If the universities would cut, for example, two-thirds of the education courses they now are teaching and would allow their professors to spend one-third of their time teaching, one-third researching, and one-third working with teachers in the public schools to develop better programs, the possibilities for developing new concepts in education could almost become limitless.

In successfully undertaking change, we know that we must involve the local and national agencies and that they must work together. Further, we must start now without money and then search for funds. We need creative ideas, and then we need to seek money. Each staff can start now if it is truly committed to the notion that schools must improve. We don't need money, we don't need better buildings, we don't need trained consultants. Yes, all of these are important, and ultimately we hope to have higher salaries and more money for materials and improvements; eventually improvement means dramatic change. In the meantime we must take what we have and begin to move rapidly in the direction of better schools.

Everything that has been indicated in this book is possible. There are in the United States now many educators who have had personal experiences with all of the philosophies and programs and guidelines expressed. Many have worked with each of the 69 revisions; many have helped implement all of them in the schools. They are possible; they do work; and they can help create better schools.

As of yet, though, we have not developed the kind of school we need and are capable of producing now. People committed to these ideas, and with notions of how they can be developed, never get together with a complete staff dedicated to the same goals, and/or we never stay long enough in one spot to develop all of these ideas in a single school. But one of these days some innovator, not quite as restless as most, more content to take the time to stay and mold together these ideas, is going to put together all of the exciting potential in education; he is going to gather a staff, a building, and a community which will insist on this accomplishment. Some educators are starting, for they know it can be done; some educators know schools can be better, for they have helped to implement all of these changes; the philosophy expressed in this book works; a few schools are doing many of the gimmicks now. They do sell doughnuts every day; they do build a daily smorgasbord schedule; they do have optional attendance and an open campus; students do have a great deal of freedom; they are expected to make decisions and accept responsibility; they do often have their entire day completely "free"; they do not need to bring notes from home if they are absent; there are no study halls, or hall passes, or bells; they do have 3 and 4 year old programs and all day 5 year old programs; they do have Pre-K through 12 closely interwoven, sharing the same facilities under the same roof; they do have elementary industrial arts and trained physical educators working with the pre-kindergarten children; they do have personalized programs and have eliminated report cards, even in high school; they do let students plan and direct their own classes; they have eliminated the old standard requirements of English, history, math, and science; they do let students out of the building, sending them, for example, to Mexico for several weeks; they have individualized instruction; they do some diagnosis and prescription; they use parent volunteers; they have a twelve month school; they have eliminated traditional counseling programs and discipline procedures; they have changed facilities; they have changed curriculum; they have a different philosophy about learning and the learner.

But they are just in the beginning stages of all these and other even more important changes. And, unfortunately, many change agents do not stay long enough to complete the job; further, before the school is completely achieved, the better staff move on to greener pastures. It has happened to most of the innovative schools; they have stopped innovating; new ones begin and the cycle repeats. This has been the experience of most innovations in the 60's.

But somewhere soon in America, educators will put together humane schools for the 70's using many of the concepts in this book; it can be any creative teachers; schools can change if they have those magic ingredients: dissatisfaction, commitment, hard work, creativeness, extra leadership, clerical and custodial help, and teacher aides. If they don't have all the ingredients now, they should not wait. They should start with what they have, then search for what is missing. Now we need to develop the non-scheduled, non-course pressured open public free school as the next alternative. Frustrating but exciting years lie ahead.

In this effort to change, if at all possible, it is true that it is helpful if some "risk" money can be set aside. Do not put every penny into salaries, buses, repairs, and new materials. In almost every change school, we have found the need to knock out a wall or buy a particular piece of equipment, or hire a teacher aide in the middle of the year. Sometimes these have proven to be short range mistakes, but in the long range view they have proven to be of great value. With each mistake we have learned: we need to have a few dollars with which to experiment without being called on the carpet or placing the district in debt.

Change involves some crystal ball judgments, and, unfortunately, we are not always right. We try to do the best, but educational decisions at the moment are not infallible; fortunately, most of the time we are right; taxpayers must accept the possibility of mistakes and evaluate performance on the percentage of "sound decisions," not on 100 per cent perfection. Remember, one Apollo caught fire before we finally got to the moon. Education must realize the same element of risk, and must provide a few dollars in contingency to correct errors. But with patience, understanding, and confidence we can overcome the obstacles facing education today.

As we close this general discussion of how to start, and turn now to more specific topics, we can conclude that schools really designed for boys and girls are no longer mirages on the horizon, but a potential reality; each student will be able to find success in a program designed to truly meet individual differences, needs, interests, and abilities. As we reflect on all the things we have said throughout these pages, many of which have been purposely repeated for impact--a plea for massive reform--we must remember that we are not talking about theory or about something that may not occur until the year 2000. We are talking about something that is practical and necessary, and something that can be accomplished in the 1970's.

Remember, in reading the chapters to come, this book is advocating that school districts immediately provide alternatives in schools, programs, and teachers on a wide continuum. The Personalized Open Program would have no schedule, no courses, no teachers assigned to subject areas, no complicated record and report systems, no clocks, and no parental pressures, but rather would have adults and youngsters operating on a person to person interest and relevancy basis, coming together on a truly mutual desire basis.

The Personalized Modified Program would have no course requirements, daily schedules, no report cards, optional attendance, and most of the items of the unstructured open

school, but would be more concerned about formal curricula and reporting systems. It would be similar to the program described in Chapter 3.

The Personalized Required Program would include such changes as team teaching, flexible scheduling, nongraded approaches, and many of the other innovations of the 60's, and would include required curricula. However, the requirements would be balanced. For example, at the high school level, rather than have 4 years of English, 3 years of social studies, and no art, the requirements would include during the four year period one year of home economics, art, music, English, industrial arts--in other words, each subject area, or combinations of interrelated curricula--would enjoy equal stature. The student could pursue these areas whenever he or she desired through a variety of options as long as the equivalent of one year of study was completed in that area.

The Group Required Program, the fourth option, would be similar to the present conventional schools except that efforts would be undertaken to individualize instruction within the present structure and to make modifications to the present structure, such as the elimination of bells and passes. If a tight security type school would be needed, for whatever reason the district might decide, such a program could be devised. In other words, instead of basically one option students now have--that option being whatever the neighborhood attendance school offered--the student would have a variety of options along the continuum from which to select. The fifth variation, the Personalized Childhood Program is described in a later chapter. Further, the same five options should be available for teacher education majors so that consultants are trained to work in these arrangements.

The chapters which follow do not detail each of these programs but are instead a blend. Realizing that in 1970 most schools are still quite conventional, or only modified to a slight extent through modular scheduling and team teaching, the major emphasis is on breaking this lockstep. The ideas presented hopefully would be useful in helping to establish any of the programs on the continuum, but the majority of the comments are aimed at helping to immediately at least develop optional programs and schools such as described earlier in Chapter 3, realizing that it offers only one of the alternatives. Individual districts must determine how many options to place on the continuum and how far to stretch their own continuum at this moment in time.

The theme and plea, of course, of this chapter and of the entire book is that if we all do the things suggested on these pages, and much more as new ideas are shared, we can create in the United States truly humane schools--schools that really are significantly different and significantly better.

Chapter 10

Individualization Of Instruction

It is now possible. In the 70's, even without all the coming technological aides of the future, to completely individualize instruction. However, unfortunately, at this writing very few schools are really individualizing. Most instruction in most classes is still group paced; unbelievably, many schools yet have some type of ability grouping. Further, the small number of schools which are presently trying to individualize, and most commercial materials currently available, remain at the lowest level of individualization--basically prescribed for the student rather than by the student.

There is no "one way" to individualize, but there are "ways" to achieve this goal. The concept revolves around the notion of custom tailoring or personalizing a program for each individual. Some students may do the same or similar thing, or use the same materials, but only if the program is appropriate at this moment in time for the learning style or styles of the individual. There are probably best ways for each learner, and the best ways for one may be far different than for those of another.

As has been stated in previous chapters, the major problem of the conventional school is that year after year students have basically followed the same assignments, used the same books, at the same time; they have been grouped, given common exams, and then issued report cards. As long as a school has comparative evaluations, it is impossible to individualize; students learn at different rates, the speed and depth of which is not measured by a grade level or an A-B-C mark.

The majority of schools which have thus far attempted to individualize are still at the stage of using programs with teacher designed objectives and teacher determined media. It is true that these programs are better than the conventional group instruction which they replaced, because they do allow students to self-pace themselves through a continuous and diversified program with little attention to age or grade level. It is thus easier to design an appropriate program based upon ability and teacher determined need. These programs can still be defended as of value for very young or very beginning students in an area where they have no experience, or for older students with experience in an area, but who need some structured guidance at this moment while learning self-direction and self-selection. Much of the current commercial material offers the "objectives" and the "media," and thus fits right into the lowest form of individualization. If individualized materials were put on a four level continuum, with level four being the highest, then these adult planned objectives and media programs would be classified as level one.

A few schools have begun to add to the pharmacy by allowing students to select additional media or all the media to go with teacher selected objectives, or they allow student input into the objectives while teachers still provide most of the media. In other words, combinations of levels two and three begin to provide in varying amounts the opportunities for students to determine some of the objectives and/or some of the materials, in addition to those objectives and materials already determined by the instructors and the commercially prepared materials. Levels two and three are certainly more desirable than level one in the majority of cases.

The fourth or more ideal level of individualization is reached when the student determines his own objectives and his own media. Many older, advanced students find this easy to do. But it can even be done in early childhood programs in areas where they can understand and are allowed various choices. Beyond the early years, a very mature student may come to the consultant and say, "I would like to reach these five objectives, and here is how I intend to do it." All the instructor need do is say fine and then occasionally visit with the student; this type of individual can even evaluate his own progress. These level four programs operate on their own time schedule; level two and three programs usually have a flexible time schedule, while in most schools, level one programs usually end up on a required time basis. Level four programming is a desirable goal.

However, most students are not at that stage at this moment of educational development. Schools have previously not allowed this type of freedom. A more common example would be for a student to come to the consultant and say, "I would like to study Nazi Germany from 1933 to 1945 so that I can learn why the Germans agreed to follow Hitler's leadership into a world war; here are the books I would like to read." The teacher must then become a guide, motivator, stimulator in terms of getting the student to more clearly see other possible objectives and other media and methods to seek answers to the proposal. By discussion, suggestions, raising the right questions, and generally causing the student to again think through his proposal, the individual eventually develops a fairly well defined set of goals and materials. However, it must be realized that often it is best to let a student chase after broad undefined objectives with limited media as a way of "learning by doing" that his proposal needs retooling, but better that he seek than lose interest by spending weeks trying to isolate specifics before beginning the study. The amount of teacher involvement depends upon the perception of the instructor and the relationship with the student. Some youngsters may struggle in the early stages of trying to develop their own objectives and methods of learning. But even these attempts are usually superior to having the program teacher planned.

Ultimately the long range goals are to have most individuals operating from a self-directed base. The teacher's role obviously is turning from that of a "sage on the stage" to that of a "guide by the side." Realistically, a school now must have all approaches to individualization available. Some students, because of age, lack of experience, maturity, learning styles, and other, still need teacher objectives and teacher media. But as much as possible, teams should build in opportunities for students to start developing their own objectives, materials, and methods. For those students who are ready, they should develop their own curricula with the consultant assisting the learner to broaden or sharpen the goals and opportunities--to see different alternatives to learning. Early childhood students can work on these self-direction programs through choice time, oral conferences with the teacher, and short range activities.

Individualization should occur in the affective and psychomotor domains even more than in the cognitive. In the past, teacher developed cognitive objectives have destroyed interest and learning by forcing students into irrelevant study at an inopportune stage of development; teachers have been handicapped, too, by being forced into the same frustrations through curriculum guides and rigid scheduling. Adults should seek the behavior patterns of their own which best bring out the maximums in the learning styles of the student. There will never be a right button to push to turn on all students and teachers every day, because both teacher and student responses will vary on given days, depending upon health, attitudes, mood, home situations, and even the weather. However, we can come much closer to the ideal than ever before.

Many teachers feel individualization is impossible with the loads they now have. They are correct if they insist on continuing to teach based upon many of the false assumptions which have dominated education over the past years. But when the structure of the classroom is changed, and as the entire school organization is revised, the process is considerably easier. At the risk of oversimplifying, and without giving specific examples in each subject area, or for various self-contained or team situations, the following five phases described in the next paragraphs should provide enough insight for the creative teacher to begin to see how the methods can be applied to his or her particular situation. These have been outlined in two previous chapters, but more explanation is provided here in an effort to increase perception as to how the mechanics of such a system work.

The most important of the five phases is the one-to-one conference held between the consultant and the student. It is here that the mutually agreed upon goals are set and progress evaluated. Further, this is the manner through which individual instruction and tutoring occur. The decision as to whether the student should follow teacher objectives and teacher chosen media, develop his or her own objectives and selection of materials, or select a combination of both teacher and student suggested objectives and media is made in these sessions.

The students arrange individual conferences with the consultant as a patient does with the doctor--usually by appointment, but sometimes by emergency. In the opening week or two of the traditional school year, students have no scheduled classes, but instead "window shop." They are encouraged to visit each of the team centers, talk with their potential resource adults, and make decisions as to curricula. Once agreement on "courses," objectives, meeting times, or mutually desirable interests and pursuits have been reached the student progresses ahead at his own pace.

To provide time for these one-to-one sessions, the second phase of individualization calls for the open studio or open laboratory concept. These drop-in experiences are generally available to all students each day in every learning center. The concept of the studio or lab is activity oriented. There is no scheduled instruction. Students come in to work on their art project, develop a science experiment, work on their golf swing, practice their guitar, write poetry, or whatever. Teachers are usually available for help and often short quick suggestions or answer type instruction goes on as the student and/or adult see a need.

The third phase is independent study. This involves more passive activity in that here usually students are reading a book, listening to a tape, or perhaps watching a loop film. Generally teachers are not available, though they could be; normally little or no "teacher instruction" takes place during independent study. The most common physical area for this to occur is in the media center.

Often the open lab or independent study phases find students together in small groups. They could be and many times are alone on a project. But this is where students who enjoy being together form their own groupings to work on similar projects or study the same topics. Even if they are working on separate learning activities, they often go together to a center to study side by side at the same time.

The idea of groups leads to the fourth phase of individualization, that of the small group. It can be used for instruction or various types of discussion.

Generally, the maximum size for a small group has been found to be 5 to 7. There are situations where 2 or 3 are much better; sometimes the groups can swell to 10 or 12, but as a rule of thumb, about 5 to 7 seems best. All the students then have time to interact in this size group; if teacher-dominated instruction is the plan for a group on a given day, the adult can usually be sure, in that size group, which students have gained the understanding or knowledge sought. Larger groups than 5 to 7 makes either task extremely difficult. These small groups should be planned a day or probably at most about a week in advance. This keeps the need relevant and current for those involved.

The fifth phase, large group, is rarely used anymore. Everyone on the same page or same unit, or same topic at the same time just doesn't make sense very often. The purpose of large group still primarily is motivation, or for special information not easily available; this means that the common thread type of presentation is usually best. For example, the police captain can make a presentation on drugs in the community. The student need not be enrolled in science, or social studies, or health, or home economics or environmental studies to come to the talk. It may have been planned as an outgrowth of one or all of those areas, but most anyone could come and benefit from the information or motivation, depending upon the purpose of the large group. Of course, a planned large group on pollution for the environmental studies class is still possible too.

Most students spend about 80 per cent of their day in one-to-one conferences, open lab, independent study, or the informal small groups formed by themselves; they could be in a "classroom," or in the student center playing cards, or in the lobby visiting, or in an area actually "studying," but they are not in formally scheduled classes. About 20 per cent of their day may be spent in small or large groups, generally about 15-20 per cent in the former and 0-5 per cent in the latter. These are not absolutes; some days a student may spend 40 per cent of his time in groups and some days no time in formally scheduled groups. Further, these vary from subject to subject and team to team. Remember these percentages should be geared to individual needs, not group or teacher determined demand. With complete optional attendance, no required subjects, personalized programming, and daily smorgasbord menu type scheduling, most of the day finds the student in informal groupings. However, one student listening to a tape is involved in large group methodology, and when the band meets once every week or two, it is easy to see how all five phases really are completely intertwined and cannot be isolated from one another.

At the risk of being misunderstood, as there really are no percentages that apply, because the individual may spend almost all his time in only one or two phases--the student working alone on the history of Ireland may spend about 70 per cent of the time in independent study, 30 per cent in one-to-one sessions, and basically no time in the other three--some general guidelines are offered for beginning teachers to attempt to help them determine how to start. For example, in some subjects such as mathematics, the student might spend less than 5 per cent in large groups, 15 per cent in small groups, 30 per cent in laboratory, 25 per cent in independent study, and 25 per cent in one-to-one situations. In English the student might spend 10 per cent of the time in large group, 25 per cent in both small group and independent study, 20 per cent in laboratory, and 20 per cent in conference. These figures can be very misleading because on a given day the learner may play cards all the time or just "goof off," or paint all day. We are looking at figures that might balance out over a long period of a week, month, or a year.

In science, the emphasis might be 35 per cent in open laboratory, 15 per cent in small group, 20 per cent in independent study, 10 per cent in large group, and

20 per cent in conference. In social science the figures for the individual could reverse; perhaps 20 per cent might be appropriate to participate in large group, 25 per cent for small group, 25 per cent for independent study, 15 per cent for one-to-one, and 15 per cent for laboratory. In the cooking phase of home economics, the percentage could be 30 per cent in laboratory, 30 per cent in one-to-one, 15 per cent in independent study, 20 per cent in small group, and 5 per cent in large group. Actually, then, the amount of time depends upon the curricula area, the objectives of the student, the perceptions of the teacher, the frames of reference of both, and many other such factors.

Part of the answer to the amount of time spent (and practically never are actual log times registered--the figures are only guestimates) in each phase is partially determined by student motivation, other involvement at a given moment in time, and diagnosis and prescription. When the curricula is more or less developed by the student through his or her own objectives and media, the student does a great deal of self-analysis, consciously or unconsciously, and prescribes for needs, interests and abilities. However, when the course of study is jointly determined or teacher determined, a detailed diagnosis and prescription is especially crucial.

More and more the medical profession is emphasizing the fact that human beings are remarkably unlike biochemically. For example, some individuals need more frequent food refueling and should eat five or six small daily meals instead of three large meals which are a concession to time and have no relationship to physiological needs. Many are now saying that man does better as a nibbling animal rather than as a ritual eater. Proteins are replacing carbohydrates and sweets for the nibbling periods.

The medical profession is also admitting many errors in their diagnosis and prescription procedures, including cases where one physician went to fourteen specialists and three nationally known clinics in the 1950's before the difficulty was finally diagnosed by a means first published in 1924, but seldom used. They have also found that the concept of "normal range" is a basic fallacy; often "within the average" means normal, whereas the score which falls within the "normal range" may be very abnormal for a given individual. And more and more we are reminded that Alexander Fleming's colleagues fought his studies on mold with bitter skepticism. Fifteen years passed before his work was recognized as the observations which led to the discovery of penicillin.

However, in spite of the flaws in the medical profession, they are head and shoulders above educators. They have at least tried to individually diagnose and prescribe for each individual patient. But educators have clung to outmoded superstitions such as all 7th graders must have two semesters of math; the decision was made, the book ordered, the ninemonth class planned, before the teacher ever met the student. Group diagnosis and group prescription remain the evil of most educational institutions. It is time to individually diagnose and prescribe, and it is absolutely essential if individualized instruction is to occur--especially when the teaching team is going to determine the objectives and materials with little or no input from the student.

The task is not as difficult as it seems. Accurate evaluation is not possible with present tools and present knowledge of the human, but neither is the medical profession always sure. They use X-ray, blood tests, team diagnoses, and other such aids, but often still are not positive. Educators have the same kind of tools available, and though sometimes not as refined as the medical procedures, they do provide techniques to begin. It may be that schools of the future will write

educational prescriptions for every pupil with the aid of a computer located in a central diagnostic center which would house a complete history of each child. Professional teachers would take the data assimilated by the computer to help prescribe a program--or the computer often will formulate the entire prescription.

In the meantime, educators do have about eleven techniques to follow; when the information from these is combined, usually the teaching team can come up with a fairly good prescription to try. We will not succeed with 100 per cent, but we can come closer than we ever have through group diagnosis.

Among the eleven or more tools will still be the subjective evaluation of each individual teacher. Often this information is extremely valid. When it is combined with the subjective evaluation of the team of teachers, the chances are even better for valid assumptions. Home made teacher pre-tests can still play a part, especially in the cognitive areas. Standardized achievement tests can be used to measure individual cognitive growth in some areas, but should not be used for group comparisons. Standardized individual diagnostic tests are available in some areas. Evaluations and tests by resource persons such as psychologists, sociologists, and M.D.'s can provide further to the information pool. Examination of previous learning history, and analysis of anecdotal statements play a part. New subjective scales such as those which might measure acceptance of responsibility will be of value. The student will contribute his own input through his expression of interests and needs. Individual parent and student conferences add further insight. More stress will be placed on the affective and psychomotor areas and perhaps less on the cognitive, or at least there will be a more balanced cognitive evaluation. All of these plus other diagnostic procedures when totaled can form the basis for the initial and followup individual prescriptions.

It is important to remember to include student input as well as that of the adult in developing a prescription. Then each team or individual can determine to the best of their ability a program based on the analysis of the data. Occasionally these will be objective in nature, but more often in dealing with human motivation, as education does, the prescription is of a subjective decision. This is why it is usually best when the student is not producing to seek team prescriptions. Several teachers taking all that is known about the individual can generally come up with a better analysis than one working alone. It is better if the student can set his own plan in motion. Either way or in combination, individual goals can be determined and progress reviewed weekly, quarterly, yearly, or at most any time, depending upon the need of the individual and type of learning occurring. Individual student conferences are held where teacher prescriptions are attempted. When the level of individualization is still at the narrow beginning stage of teacher objectives and teacher media, then the teacher determined prescription is explained to the student. If the level has reached the point where the student prescribes the program, then the teacher merely serves as a consultant. Most prescriptions now are a combination of consultant and learner input. As much as possible students should be heavily involved in determining their present involvements and future directions.

In order to really make individualization work, the curricula, teaching and learning strategies, scheduling, and all the other ingredients must change. Following are some illustrations of how beginners can start. It should be easy for educators to understand how individualization occurs when the student selects his own program and where daily flexible scheduling, optional attendance, no report cards and other important items are in the mix.

Rather than give detailed examples of these, the generalizations described here are combinations of teacher and student developed objectives and media. They should provide enough ideas to allow most anyone to develop an individualized approach in any school in any subject. Admittedly it is much easier in an open concept school with huge resource centers, optional choices, and heavy doses of freedom and responsibility. But every school and every teacher can start modifications of individualization in almost any framework. The important thing is to start and then let the demands of the program eventually push away the remaining barriers.

Again, the preferred way to plan individualization is through conferences where the individual student develops his own objectives and meets with the teacher or other students in a group activity only where it seems to be desirable at a given moment in time. But leaving this ideal for now, an example is presented in the area of social studies which shows how teacher and students can begin in most any situation with a compromise in objectives and media.

In high school programs, and hopefully all will soon be nongraded, students enrolling in a particular "social studies course" may be conventionally classified as ninth, tenth, eleventh, or twelfth graders. It does not make any difference, for in this situation they will all be involved in an individualized program, but in this specific illustration, one built around a common thread. In a conventional school just getting started, a typical two week period planned around the topic "The Effect of War on an Individual Nation" might be scheduled very easily.

On Monday of the first week the teacher may give a large group lecture, show a film, or bring in an outside resource person to discuss the topic. It does not matter if these students are ninth or twelfth graders, smart or dumb, tall or short, pink or green, or any other description we may try to use to erroneously classify students; they are all affected by general mobilization and total war. Tuesday no classes are scheduled; the teachers use the day for planning while the students are involved in independent study activities. They are reading and searching for materials related to war as it affects an individual nation. On Wednesday half of the students may come to the teacher for small group discussions throughout the day, while the other half continue some more independent study. On Thursday the procedure is just reversed: the second half come in for small group discussions, and the others do some more independent work. On Friday the teachers make themselves available for individual tutoring and individual conferences.

The following Monday some of the students may be in lab and the others may be in small groups; on Tuesday this may be reversed. On Wednesday and Thursday the students might be involved in individual conferences, individual tutoring, or small group planning. Teachers have an opportunity those days for some reflecting and discussion among themselves. Friday all the students may meet in small groups. Over this two-week period, each of the students has been involved in one large group, three small groups, one lab, and several independent study or individual conference sessions.

This description, of course, is just a general picture of what many of the students might do. It assumes required courses and attendance. If a smorgasbord approach is taken, the above tight structure might never be used. Even with tight structure and required classes, if the program is really personalized and individualized, the students may scatter in completely different patterns; however, because they are

all studying the same general broad topic of war as it affects a nation, they can be brought together for small and large groups and lab experiences on the basis of the common thread.

Their independent study can be individualized into many areas of interest and levels of ability. One student may study war through sociology--what happens to the family unit during war? Another student may view the topic through economics--what about inflation, shortages, and other. Another student pursuing the historical approach, may look at war in general throughout the history of the world. A fourth student may tackle the problem through political science, looking at decisions which are made in war which may not have been permitted in time of peace. Another student pursues war through art; for example, he may study paintings portraying the forces of war as they affect individuals and the nation. Another student could take a look at the kinds of music written during war and peace--is there a difference? A seventh student could look at war through the world of the theatre--how do the dramatists portray war? Another may look at it through the literature or poetry of the country and still another may tackle the effect of war via the technology developed, sometimes as a matter of survival. One student may study war through several types of novels or may study the views of various philosophers.

All of these pursuits can be done on different levels. The college type advanced person may be reading very detailed topic books in his area, whereas the student who currently may have difficulty in reading may be doing most of his work through oral-aural-visual sessions with teachers and students in small groups or independently. One student can be studying an historical approach by reading a typical junior high history book related to war; another student may be reading the same type of content but in a college text.

For their lab sessions some students may be attempting to paint a picture of war as they perceive how war affects a country. Another student may be writing a piece of music to define his emotions or feelings toward war and its effect on individual nations. A third student may be writing a play or writing poetry or visiting welfare agencies to discuss family separations which occurred as a result of war.

In other words, by having students follow a common thread, the program can be tailored to individual needs, interests, and abilities as related to the general broad topic. One question, of course, that should be answered before the students ever study the effect of war is whether it is an appropriate topic in the first place. Perhaps a student already has a good perspective of the problem via other study that he had done previously, or perhaps this student would have benefited more by being in shop, art, math, and science this quarter and would have been better off dropping social studies at this moment in his development. In group-paced instruction there are always some students who would have been better placed in a different program.

The basic description above can be recognized overall as a level one type of individualization where the teacher(s) set the objectives of the unit, provide the materials and establish any alternatives. It is a simple way to start. But it is easy to see how levels two and three fit, for the consultants can establish some general objectives and media, but can allow students wide latitudes of freedom in letting students spell out their specific objectives and additional media, as was suggested through the different students involving themselves in areas of choice such as art, sociology, or music.

However, it is even easier to visualize how this could be a level four completely individualized student planned and directed program. For example, suppose a teacher only had one student. This student could elect to study the effects of war on an individual. He could set his own objectives as to what he hoped to learn and he could select his own material. He could become involved in large groups by watching a film or listening to a tape or record. He could heavily engage in independent study through reading a number of selected books and articles. In his open lab he might choose to paint a picture of war, write a play, develop a written analysis, or organize a peaceful war protest group. For his one-to-one conferences, he can select a teacher and/or adults in the community to discuss his interests, questions, and findings. For small group he could eliminate that phase, or discuss his study and views with informal small groups of friends or other students, or could from time to time plug into other related social studies group classes such as a world problems seminar, a sociology course, a history group, or even a drama seminar if during his open lab he chose to write a play.

The theater is such a perfect illustration to show how one person on level four could get involved with an interrelated curricula and team of teachers, for as he studies "The effect of war on an individual," and then writes a play to depict his opinions, he becomes involved with the traditional separations of theater arts (the play), English (the written script), art and industrial arts (the sets), home economics (the costuming), music (the theme and background), social studies (the history of the period depicted), and even math and science as sets are measured and harmless chemical bombs are built for explosive effects. In other words, the opportunities are limitless, and with the theater, group experiences can be so effectively interwoven.

The creative teacher can help students into these activities at any age level or depth of ability or involvement. Obviously young children need a slightly different approach, the play will be less sophisticated (though perhaps more creative), and more help in set construction, for example, will be needed. But each team of teachers can attempt to help motivate, or take an already motivated student to the ends of the world educationally. It can be done on a complete level four individual approach or back on a level one self-paced but more directed philosophy. When it grows out of the Personalized Open Program briefly mentioned at the close of Chapter 9, the results are sometimes fantastic.

The following paragraphs will not be detailed for each subject or possible topic. The illustrations hopefully will give interested students and teachers ideas of how a program of completely individualized, self-paced continuous progress, non-graded, personalized instruction can be developed for any age level or subject. The closer to level four, the more personalized, but it is realized there are some schools, students, teachers, or parts of some subjects are best taught at this moment in man's humanistic and mechanistic development at the level one stage.

The important factor is that individualization is practical, not theoretical. It can be achieved with the present buildings, staff, materials, students, and budget. Obviously, a school planned, constructed, and staffed for an individual concept can accomplish the task easier and hopefully better, but the author will guarantee it can be done in any school in America with commitment, reallocation of resources, some in-service training, and the willingness to struggle for a few years. The next paragraphs give hints at some possible ways even the most traditional schools can start. For those already at level one of individualization, the descriptions may provide additional ideas. For the few schools at level four, these will be

obsolete, but perhaps will reinforce the directions which that school has chosen to follow.

Look at individualized reading in the elementary school. Assume that we have traditional first, second, third, and fourth graders in the same pod. Five students might be working out of programmed readers but all on different levels geared to their pattern needs. Another five might be working from skills kits, the materials again at different levels. Ten may be working on basal reader materials, but these readers may traditionally range all the way from kindergarten to eighth grade. Another five might be working with library books in a recreation reading program. The teacher may be working with one student at that moment while the others all work in their individual materials. Individualized vocabulary and spelling programs can be included in this general individualized language approach. Students can still work in small groups when it is determined that four or five may need specifically the same skill at a given moment. These do not necessarily have to be all "second graders"; there may be some traditionally labeled second, third, or fourth year students who all need the same help. They can meet in small groups to discuss topics that have arisen through their recreational reading.

By using programs such as the literature materials read by the instructor, all the students, regardless of their level of ability, can listen to the same story read to the entire group, discuss the ideas in the story, and write individualized thoughts through their writing lab experiences. When students can select their own materials, when they are not divided into three ability groups, when they can read at their own pace, when skills are learned as needed, when individual reading conferences are held between the child and the teacher, when records of progress are kept between child and teacher working together, when there is extensive use of the resource center, when there is continuous evaluation, and when there is emphasis on personal progress rather than group comparisons, individualized reading becomes a tremendous asset to the school. Children's attitudes toward reading improve, the quantity of reading increases, the children prize the individual contact with their teachers, there are less discipline problems, and general reading achievement is usually higher than that accomplished in a traditional program. All of these are possible if teachers will stop insisting on meeting all of the kids each day in small groups.

A third area of individualization can be shown in the foreign language program. At a given moment in time when students are found in the language center, a few may be listening to individual tapes at various levels, others may be listening to records which reflect different levels of skill development, or making tapes, while still others may be having an interview with the teacher in the language being studied. Advanced students may be working with beginning students in a small group tutoring situation. Other advanced students may be discussing a topic among themselves in the foreign language, some may be reading materials, some writing, some looking at filmstrips, and some reviewing vocabulary. In other words, every student can have a different activity going on at a given moment and can be brought together in small groups for discussion or skills instruction when it seems appropriate to do so. Obviously activities are limited for the first weeks for beginning students who must have some background in the language before they can participate in all the possibilities; but having advanced students more on an individual, self-paced program gives the teacher a chance to work more with small groups of beginners to allow them to comprehend some of the language and quickly move at their own pace.

Math is one of the easiest subjects to individualize. As a starting point, a teacher can take one book and spread the children out in different chapters in that particular book. As students begin to grow out of the book and other materials become available, students can be involved with different programs at different levels. Students keep their own folders, take their own tests, and mark the number correct. These tests are in a file cabinet and available to all the students any time. Every so often they take a formal evaluation--a type of test prepared by the instructor and checked by him so that he knows when the students pass the particular material being tested, and they know, at least at the moment, the topics they have studied over the past few weeks.

Very few small groups are needed in math except on some skill areas where students can be brought together for common needs. Sometimes a small group discussion is of value to explain the role of math in a particular area; occasionally, large group interest or lab group skill presentations can be made. One or a few students listening to a teacher or a tape is actually a large group. Under this plan in math, students in grades six, seven, and eight, for example, could all be together in a large room working at their own pace. We know that students are spread over a ten-year span at most grade levels; again using the typical seventh grade, remember they range in achievement from grade three to grade thirteen; it becomes impossible to have a seventh grade math book, a seventh grade program, and give all kids the same instruction at the same time. Most students can work through these materials at their own pace and seek help from a teacher or another student, because in this plan teachers and students are available for assistance. The teacher is not involved in teaching large groups of students each day, and students are not required to sit 55 minutes in a class and listen to the teacher or do the group-paced assignment.

In the area of home economics, two girls and one boy might be cooking different types of foods, four girls might be sewing, three girls might be working on interior decorating, two girls and two boys may be involved in home design, two more could be discussing their next project, three may be discussing child growth and development, four may be discussing some phase of marriage or divorce, and two might be in an infant care unit. Another girl may be knitting, one reading a home economics textbook, one writing his own Unipac, one developing ideas for a demonstration program, four listening to tapes, one watching a filmstrip and one a single concept loop film, two watching a regular film, one ironing, one washing dishes, and one confer-ring with the teacher. All of these activities can go on together in an individualized coeducational open lab approach. Teachers can pool the students together for some large group common threads if desired. For example, in the area of social psychology or child growth and development, group discussions are quite appropriate; but most of the work in home economics should be tied to a self-directed individual approach. The students can usually determine their own objectives, especially as they progress in experience; the young ones in the K-1 years usually need teacher direction and objectives and some basic skill presentations.

In English, a group of mixed grade 9 through 12 students might study the definition of beauty. In the large group presentation they might see a view of a lake which most all would agree was beautiful. On that lake might then appear a boat with a father and three children, and mother might be standing on the shore. Suddenly mother sees the boat capsize, and father and the three children drown. The students are then asked if this scene remains beautiful to the mother; does this lake now define the meaning of beauty for this individual? In small groups they can discuss the topic of what is beauty and what is meaning. In their independent study they can read at different levels in poetry, short stories, novels, and otherwise search

for materials that they might classify as beautiful. In the lab situations they can write poems or short stories or plays at different levels of ability related to the concept of beauty. Again, this structure relates to the required course approach; when self-selection occurs, the above still might be useful to small numbers of students but not to an entire class. Obviously at level four of individualization, one student or small group could determine such a program themselves without teacher set assignments.

A course titled Theater Arts could be built around a combination of music, drama, art, industrial arts, and home economics. Students taking this course with a common thread theme would work on a variety of individual materials. One might be writing some music for the production, one helping to select published music that the students desire to use, some writing the actual play, some designing the sets, and others building the sets. Another student may be involved at that moment in memorizing lines for individual rehearsal, another might be working on stage details which are part of the production, two others might be listening to a record that is related to the production, and another might be making a tape.

These are not detailed illustrations of individualized instruction, but only suggested guides teachers can consider. In summary, there are three points which should be made. In individualized instruction and personalized programming, it is quite practical and possible that only one student may be taking one particular course out of the entire student body. This student then would not necessarily be involved in much interaction, except for the possibility of interaction with a tutor or being brought together with others who had studied a similar topic or area either previously or at the same time. In other words, we do not always need a common theme. Students can work on materials that are of value only to them as an individual.

Others may be working on completely different materials such as in the reading program, but they can be brought together when they have a common need or common interest or by using common materials. These are not permanent groups and are not necessarily planned far ahead, but instead are a joining of individuals when there is a need.

A third way of developing these programs is through the common thread approach. The students involved in the common thread program can easily be brought together for interaction, but at the same time, except for relating to a broad general theme, can be pretty much individualized in their approach to the program.

Obviously in order to individualize instruction, we need a different method of scheduling and grouping, and an attitude which reflects the notion that teachers do not have to meet with all students every day. Further, in addition to teachers being trained differently, we need different materials to individualize instruction. We need to write packets, capsules, contracts, and other individual guides. Students need to develop materials common to their specific goals. Commercial companies must help by preparing alternatives. We need multiple textbooks instead of a single textbook. We are going to use more paperbacks and more programmed instruction items. We must take the materials we now have, such as workbooks, and tear them up and use individual parts of these programs. We must take the group-paced project materials, in the forms similar to the developments which first produced the new science programs, and reorganize them to be taught individually. We are going to need more than reading materials, and we need assistance in the selection of filmstrips, single concept loop films, and commercial tapes. We need to make tapes, and we need to beef up the libraries. We need to get the

students out of the building and into projects which involve working in community opportunities. We need to let students write their own lesson plans, choose many of their own subjects and offer a broad selection of activities. Individualizing instruction is not impossible. The only things in the way now are the lack of trained teachers and the lack of individualized materials.

Some have asked whether we really can diagnose the needs of each individual. Remember, on level four the student does the diagnosing and prescribing with assistance as desired. When done by the teacher, as was explained earlier in this chapter, most of the diagnosis is going to have to be done with approaches we already have, such as subjective teacher evaluations completed on an individual basis, and subjective team evaluations where several teachers work together, for in describing individualized instruction, it was assumed that in most cases where the size of staff permitted, teachers were working in team arrangements to develop programs. We are going to use homemade teacher tests, standardized individual achievement tests, standardized diagnostic tests which may be available, and evaluation by resource persons such as sociologists and psychologists. We are going to complete case studies for individuals and use social inventories and problem check list sheets; we are going to examine their previous school records, including anecdotal statements. We are going to involve the students in individual conferences for analysis of interests, needs, and abilities. We are also going to develop new subjective scales for rating student growth in acceptance of responsibility and ability to make decisions, and we are going to have more student-parent conferences. These items have been repeated here to again emphasize that we have the capability now in most schools to individualize instruction.

Once the diagnosis is accomplished, the teacher or teachers in the team are going to prescribe to the best of their ability a program for the individual, based upon the results of the diagnosis. Does Mary need more foreign language? Does Jerry need to learn to analyze concepts? Does Jimmy need staccato type teachers? Should Henry use basal or programmed readers or both? In other words, on the basis of the identification of needs, interests, and abilities for that individual, we are going to prescribe a program that seems to make sense for that individual. The students should be consulted and involved in understanding this prescription. We are going to need to prepare for student individual objectives, performance criteria, and fairly specific prescription of expected accomplishment at the end of the week, quarter, year, or course. On the other hand, some students should have none of these teacher prescriptions, but instead should completely prescribe for themselves.

In most cases we should meet as a team to discuss each child and form a group prescription to lessen the chance for error, especially in the more difficult cases. In the first months in this program of team analysis, teachers say they do not know the children as well as they did when they had them in their own self-contained room; but after these first few months, the teacher begins to realize that by the information gained in discussions, he knows the individual better than he ever had before. In the team meetings, the teachers must talk about individual students and about learning experiences for these students. Again, this is not all theoretical; it is being done in a few schools. In some programs, the students do much of the prescribing, as courses and attendance are both optional. Many students plan almost all of their work on level four: they choose their own courses, their own teachers, and select most of their own goals and media.

Teachers need to have a pharmacy ready so that there are a number of solutions or alternatives to learning. In other words, if we can just take a look at this

whole problem the same way that an M.D. does a patient, it is not too difficult to work out a plan. The doctor diagnoses the individual patient as well as he can, with input from the person; on the basis of this diagnosis he prescribes a program. He re-evaluates his prescription after a period of time and finds that if sulfa is not working, he switches to penicillin; if penicillin is not working, he may switch to aureomycin. If none of these work, he will do another diagnosis or call for a team diagnosis because the problem may be more difficult than he first surmised. It is true that the doctor does not have 150 patients each day, but he may have 150 patients which he sees over a period of time. Part of the theory for survival is not to see each of these patients each day; this is one of the needed changes in the schools--to accept the notion that students do not have to come in contact with every teacher every day. Some patients do their own prescribing; they decide they are not sick enough to see the doctor, or they tell the doctor what they want. Educationally they may not need help from the teacher all the time, the same as many individuals do not see the doctor every month.

In the above paragraphs we have tried to point out that individualizing instruction is an exciting potential for schools, that it is practical, that many schools are starting to do it now, and that within the next few years all good schools will have students with personalized curricula. Within these curricula, learning will be individualized on a continuous progress, self-paced approach. The decision that must be made now is whether or not school staffs are going to commit themselves to improving the instruction that is now taking place in the group prescribed programs which still occupy 90 per cent of the teaching at the present time in the schools of North America. Group requirements and group prescriptions are that common. Unfortunately most of the individualized programs are still at level one, with some input from levels two and three. Only a handful are heavily involved in level four.

Any teacher who has been a parent can easily convert to individualization. Just ask how the first child was taught. Then when the second one came along, one who was entirely different, the parents set different learning tasks. When individuality and learning styles of each child are taken into account, he or she will learn in less time. What can be done with one can be done with 30 with the right organization and program. Individualization is a popular but very misunderstood concept. It is not a panacea for everyone; some students will not be reached, but it is the best way we have now to adjust to the educational task, the teacher's behavior, and the learner's behavior as a means toward achieving successful learning opportunities for as many as can possibly be motivated to learn.

Chapter 11

Daily Smorgasbord Scheduling

For many years North American high schools have followed a ritualistic pattern of scheduling students into classes on the basis of 55 minute periods with five minute passing times between the bells. Occasionally schools have varied this to seven or eight period days; junior high schools have often had 42 or 45 rather than 55 minute periods. In the elementary school, scheduling has been done on the basis of assigning 25 to 35 students to one teacher in the so-called self-contained room. There were absolutely no reasons for these patterns other than administrative convenience, and as a very simple mechanical device to handle increasing numbers of students entering the schools. Traditional methods of scheduling served a purpose at one point in history, but now we know that self-contained classrooms and period 1, 2, 3, type high schools with bells ringing, hall passes, study halls, and all the rest of the organizational minutia that have interrupted the learning process for a number of years no longer make sense for schools in the 70's.

There is no evidence or research to support these conventional procedures. Yet year after year principals set up conflict charts and work during the spring and summer to fit students into slots strictly based on the number of seats in a classroom and on invalid course requirements. The assumptions upon which the traditional system has operated will not stand the scrutiny of research. All classes do not need to meet every day, yet the traditional system has assumed they should. All classes do not need an equal amount of time, such as 55 minutes for every subject; some need longer and some need shorter periods, but even if one tried to defend equal time, why not 52 or 58 or 67 minutes? They would be equally wrong, but as equally defensible.

Over the past years, many schools have recognized these fallacies and have searched for alternatives; such variations as four 70-minute periods a week, floating periods, reversing hours so that on Monday sixth period actually met at first period time, assembly schedules, multiple option schedules, and other such patterns have been tried. Even 30 years ago some schools had activity periods where students had one period a day unscheduled to become involved in student programs such as clubs, athletics, assemblies, free choice, and tutoring sessions. Ironically, Wilson High in Long Beach, California, in the 1940's, under the direction of principal Harry Moore, was a leader in pioneering some of the new scheduling concepts. Students attended classes only four days a week and had an hour free every day. When Mr. Moore left, the new principal reverted to tradition. These varied efforts did not go far enough, nor are they now any more defensible than the straight 55 minute period, although most of them at that time were improvements, especially in the affective domain, even if not in measurable cognitive terms.

In the early 60's we are all now quite familiar with the development that took place at Stanford University and their work with Marshall High in Portland and other such pilot schools to develop a computer-generated schedule designed partly on the basic GASP system written at MIT. The program has become commonly known as the flexible modular scheduling system. Offshoots of that program such as those developed at General Electric, McDonnell Automation Center, Indiflex at the University of Indiana, and other similar efforts brought variations to the pattern.

Marshall High in Portland, Oregon, has just recently developed a hand-loaded system which seems to have improved the original Stanford concept. It is now quite common to find a number of modular-scheduled schools in each state; unfortunately, when one looks closely at these schedules, it is easy to see that most of the modular schedules are still better classified as inflexible, flexible schedules--or at least staffs operate them that way. Most are certainly better than the old 55 minute period bus schedules where principals said: "The buses arrive at 8:30 and leave at 3:30. If I have a seven period day and assign each student one period for lunch and one period for study hall and have five minutes in between each period for passing, then I will have a good program." However, all of these efforts--the bus schedules and the flexible modular schedules--are now obsolete as we reach into the 70's.

While Stanford was developing its program under Bush and Allen and graduate assistants at Stanford, along with the principals of the schools they worked with, and while additional similar efforts were taking place as offshoots of the Stanford type effort in various parts of the United States, two other developments of great national significance were taking place in the area of scheduling. They did not receive the publicity of the Stanford program, but in the long run probably will have a greater impact on future scheduling at the national level. One of these efforts was at Brookhurst Junior High in Anaheim, California, where in 1963, Gardner Swenson and his associates were developing the concept of the daily demand schedule. Through the use of Royal-McBee keysort cards and four staff members, Brookhurst had generated a brand new master schedule each day planned three days in advance, which allowed for most groups to meet without conflict and which provided individualized schedules for most students. At the same time Bob Dunsheath and Don Glines at the Canyon del Oro School, and Evelyn Carswell at the Walker School, and the staffs of those schools in the Amphitheater District of Tucson, Arizona, were developing the concept of daily teacher controlled variable scheduling, built first with cardboard slips, then peg boards, and finally by teams of teachers. The Canyon del Oro-Walker programs, along with the daily demand type program at Brookhurst, became prototypes for the developments in daily scheduling which have occurred nationally the past eight years.

The major deficiency at Walker and Canyon del Oro in the early stages was that students were still moved more as groups than as individuals, but both programs were able to operate with the same budget and staff as those of traditional schools; further, these daily schedules soon proved that they took much of the boredom out of the school day. Additionally, by scheduling daily, one day in advance, as done at the Tucson schools, teachers could ask for large groups, small groups, independent study, open labs, and one-to-one conferences on the basis of daily need. Classes could be scheduled at any hour of the day; assemblies no longer became interrupters of the program; kids enjoyed the variety; attendance rates went up; discipline problems decreased; learning became more fun. The concept of "with freedom goes responsibility" began in these two Tucson schools as much as it did anywhere in the nation as related to the public school sector of the North American education.

In the meantime, during this same period of the 60's, other schools began to operate block type programs where teachers were given a core of students to work with all day or for a given period of time. Teachers in these pod-type teaching arrangements, such as Ruby Thomas Elementary School in Las Vegas and some early pioneers in California and Massachusetts further developed the concept of flexible movement. As the ideas of freedom, responsibility, flexibility, and options began

to be accepted nationally, school districts such as University City, Missouri, further developed open scheduling. Ridgewood High in the Chicago area worked hard on new directions for the computerized modular system. The Nova, Florida, program built in flexible blocks even at the high school level. Bishop Ryan High School in Omaha developed "homemade" modular schedules and now are thinking in terms of non-scheduling. Though most of these schools mentioned are no longer functioning with innovative schedules, they and the many others too numerous to name, some which even became much more sophisticated than those specifically mentioned, were the real pioneers in educational organization as related to scheduling. However; almost all of the programs had flaws. First, most of these schools retained required courses; the teachers planned the curricula themselves, or as members of teams. Group requirements and group-paced instruction were still prevalent. The major difference became time and methodology factors; classes were now scheduled to meet as large groups and as small groups for about 70 per cent of the week; students were left open for independent study or laboratory time about 30 per cent of the week. Classes met for shorter and longer periods of time than 55 minutes, and often only three or four times a week rather than the five conventional scheduling. However, very little true individualized instruction occurred; content and requirements, though varied, remained very similar to the past.

During the 60's, more flexible movements took place in the elementary levels, too, where teams of teachers in open pods with blocks of time began creative organizational patterns; unfortunately, those great starts bogged down because parents and educators were still handicapped by the traditional concept that the cognitive domain was more important than the psychomotor or the affective; they built in rigidity, again to make sure that all students had a required number of hours in the areas we have erroneously labeled basic skills--primarily reading, writing, and math. Home economics, industrial art, physical education, art, music, and drama--the really important subjects in the primary years--took a back seat as they always have, even at the secondary level, as second rate citizens--as frills or dumping grounds to and for the "academic" program. Junior highs tried some new approaches but still stayed locked into the horrid seventh grade curricula called required English, history, math, science, physical education, and a semester of art and a semester of music. The middle school movement was the great hope of this era, but it fell back into the trap of required content and skills at each "grade level." High schools were scared to death of the colleges, state departments, parents, and even the shadows of their rigid departmental chairmen, and either stayed on the 55 minute period or finally consented to try the modular system. If the schedule failed, at least the computer could be blamed for conflict and mismatch of teachers and pupils and for deficiencies in programming.

To help solve all these dilemmas, Glenn Ovard and associates at Brigham Young University took the concept of the daily schedule from Brookhurst, Canyon del Oro, and Walker, added their own ideas, and developed a demand type schedule built daily on the computer. It was by far the most innovative, creative method of scheduling yet developed at that time in the United States. The Brigham Young program, though retaining required classes, developed systems whereby individualized instruction and small group interaction requests could be fed into the computer, the results being a brand new master schedule every single day of the year and about 98 per cent conflict free. Though their laboratory school had to close, Brigham Young educators have continued to explore this approach.

Now in the 1970's bold new types of scheduling have been created. Taking the newest national developments in the area of scheduling, staffs such as those of

the Wilson Campus School at Mankato State College, some of the NASSP model schools, and others have developed open daily scheduling processes; some schools are not even bothering to build schedules any more at the high school level. As one example, the current Wilson type is titled Daily Smorgasbord Scheduling; it is built by hand in about one and a half hours for 600 kindergarten through 12 students at no increase in cost except for the quantity of paper devoured, the need for a scheduling clerk, and the manpower of people necessary each day to develop the schedule. Daily smorgasbord scheduling has completely revolutionized the whole concept of school organization and has led to the ability to truly begin to develop a humane approach to education. In the following paragraphs, first the concept which must be accepted to implement daily smorgasbord scheduling will be discussed. Then, some of the philosophies and the mechanical processes for daily scheduling will be reviewed. Finally, the present state of its development will be summarized.

In discussing daily smorgasbord scheduling, the first effort must be to understand much of the philosophy that is involved before the mechanics can really be understood. The "why" is more important than the "how." Further, of the "69 changes" now underway nationally, daily smorgasbord scheduling is only one. By itself it may not be that important; but without it, most of the other changes could not function. Before exploring the how further, the reader should be sure to understand the description of the school program presented in Chapter 3. Almost all of the changes discussed on those pages are interrelated in one way or another with the daily scheduling process.

Within the philosophy described in Section B, the mechanics of building the schedule are not at all complicated; the more one accepts the freedoms and responsibilities given to and expected of parents, staffs, and students, the easier the task. However, it should be noted that if a school is not willing to adopt the complete daily smorgasbord philosophy, a daily schedule can still be constructed where required courses, required attendance, and other tighter structures are possible. The daily variable schedule and the daily demand schedule, discussed earlier in the Canyon del Oro and Brookhurst Schools, both provided for as much rigidity as needed.

Even in the daily smorgasbord scheduling, individual students can be structured all day long on the basis of need by having them fill out a carbonized copy of their program each morning, or the previous afternoon, which is then distributed to the instructors. Attendance can be taken the same as it is in any school. In the early stages of daily scheduling, about 5 per cent of the students do need this type of schedule; another 15 per cent need modified less-structured forms--one copy which can be signed during the day and returned to the advisor. The other 80 per cent do beautifully, or at least operate on an acceptable open basis; some of the 80 per cent do need occasional reminders; but after a period of two or three years, this usually is no longer necessary. For example, the young children who have only known an open type program have very little difficulty. The students who are in a transition stage from the old to new have some problems; but as one would expect, many do beautifully in a day or two.

As to the actual mechanics of scheduling, the details would take a small book. For purposes of this chapter, we can only outline some of the basic steps to show that the notion is practical, realistic, exciting, and in operation in today's schools. Below are listed a number of steps or phases related to the building of the schedule to give the reader some idea of how this is done. A manual is

needed to spell out the day-by-day cookbook recipe which schools could use as a model to start and then eventually modify for their own school situation. In the meantime, the following procedures should enable the creative administrator to start writing his own recipes without waiting for the "model" to be published.

1. Each teacher or teaching team and/or groups of students turn into the scheduling clerk each day before 9:00 a.m. the requests from each center for the following day for the desired combinations of individual conference or tutoring time, open studio or lab time, independent study, small groups, or large groups. These requests contain the groups of students desired, the amount of time, any special needs, the room desired, and any necessary comments. Sometimes teachers have no group requests, so only a request for open studio, or open lab, or individual conferences, or close, or some other comment is presented.
2. The scheduling clerk spends from 9:00-9:30 compiling an overview of schedule problems for that day.
3. At 9.30 the clerk is joined by three other adults (at least one or two teachers, a student teacher, an aide or other). These four spend from 9:30 to 10:30 or 11:00 putting the requests turned in from the teams on a master menu, which will become the offerings for the next day. Remember, this schedule is developed one day in advance. The team builds the menu in the following order:
 - a. special requests or hard to schedule needs
 - b. teacher conflicts and closed requests by teachers
 - c. younger children to make sure they are as conflict free as possible
 - d. scratch schedule of room requests already scheduled to check for conflicts
 - e. scheduling of remaining classes that have been requested
 - f. completion of "open" times such as for optional labs, conference, study
 - g. check final schedule for conflicts and accuracy
 - h. recopy and make a ditto master on the thermofax and then ditto 60-75 copies
 - i. distribute one copy to each teacher's mailbox and then post copies on certain walls around the school
4. In order to list all of the rooms in the school, four large sheets of paper are used which are then posted side by side on the walls, or which are clamped together for distribution to teachers. The four who form the scheduling team each have one of these four sheets to complete. For example, the Environmental Center rooms (science, social studies, environmental studies) are listed on one sheet side by side. This is true for all the centers. The requests as scheduled for each center need to be cross-referenced for avoidance of major conflicts for students between the offerings of each center but still knowing that some conflicts are inevitable.
5. Teachers are rotated on and off the scheduling team on a staggered basis so that never do all three of the other schedulers go off at the same time. This provides for continuity as well as sharing the task of scheduling. It further is a good in-service training technique for teachers.
6. The schedule is posted for the following day by 2:00 p.m. of the day the schedule is constructed. That way teachers and students can, if they desire, check their plans for the next day before they go home.
7. For "1st grade" types of students, the counselor/advisor for each student helps the child make out an individual schedule. It is usually written down on a

narrow schedule time sheet so that the student can carry it as a reminder of where to go, or can get help from an older student if lost. Centers can also be color coded and colors used on the schedule for young students instead of written words or symbols. Older students who need some structuring use these sheets. These can be required for strict attendance for those who temporarily need help in accepting responsibility and making decisions. However, except for very young children, 98 per cent of the students by the second year write nothing down but just check the schedule and go when the time arrives--or skip the schedule entirely that day if they know even before coming to school that they want to spend all of their time in industrial arts.

8. Most students have about 80 per cent of their time scheduled as one-to-one conferences with teachers, open lab, or studio, or independent study. These do not have to be listed on the daily master schedule, except that the times open labs and conferences are available to students are usually marked on the menu to help with the decision-making process. Students may then go whenever they desire and stay as long as they wish. About 20 per cent of the time the student is in small or large groups. These are scheduled at specific times, either by the scheduling team, or informally by three to six students who get together to decide when they and the teacher are both open and, thus, schedule their own meeting.
9. There are occasional conflicts in a student's schedule. However, these can be reduced if they bother a staff the first year by having each teacher turn in a conflict match of other courses which bother him most. For example, band might list creative writing, Indian cultures, chorus, yoga, and fencing as its biggest "enemies." The scheduling team tries to avoid scheduling these groups back to back.

Further, remember all classes do not meet every day or for the same amount of time; generally, only 20 per cent of the student's day is in a structured group class. The rest is in unstructured small groups, individual work, or spur of the moment plans. Thus, conflicts are further reduced.

Personalized schools have so many mini-courses and mini-mini-courses of four to six students for three to six weeks that it is extremely difficult to keep track of all the conflicts. In most cases conflict charts are not attempted with short mini-mini-courses, but for a mini-course which is going to extend over a stretched-out period of time, conflict charts can be kept if desired.

There is a different philosophy about conflicts. The traditional school says it has no conflicts, but in the spring it establishes that French IV, chorus, band, journalism, (all singletons) will be first period. A student must choose one of the four, but cannot take all four. In open schools, we think a student should take what he needs. Therefore, we build in conflicts.

But the same conflicts do not occur over and over as there is a completely different schedule each day. In a 12-month school, open about 240 days each year, 240 brand new schedules are constructed, rather than the one built in a traditional school, or the five built in the flexible-modular Stanford type arrangement. Thus, if there is a conflict, it is treated the same as if the student were sick. The student may miss the class entirely; on the other hand, he may listen to a tape of the presentation or discussion, or meet with a teacher later, or meet with some of the students later, or can see a video

tape of it, if the session were that important. Remember, attendance should usually be optional; sometimes students would rather spend all day in the art studio, and thus miss all their scheduled classes even if there is no conflict.

10. Students develop much of their own curricula. Thus, many "classes" are scheduled by students and not by teachers; students working independently in a course avoid conflict by scheduling one-to-one conferences. Instruction should be completely individualized. Group meetings grow out of individual needs, so missing a "class" is not like missing a group-paced program. Actually the words "class" or "course" begin to disappear to be replaced by "experiences." Students in open schools are involved in multiple experiences; they do not participate in the usual courses or class required group instruction.
11. If there is a question as to whether this type of schedule can work without optional attendance, no report cards, choice of teachers, individualized instruction, team teaching, nongradedness, and all the rest, the answer is a big yes. There is a difference. The more open method is called daily smorgasbord scheduling. Some schools are now emerging with "no schedule," or only scheduling the few group activities which might be arranged for various days.

But if a school desires some structure at the beginning, this more structured type schedule should be called "daily teacher controlled variable scheduling." For example, where seventh graders take the usual English, social studies, math, science, physical education, art, and music, the "groups" can be moved daily to each of these subjects as requested by the teachers. A group may go 45 minutes to English, 75 minutes to art, 75 minutes to physical education, 60 minutes to math, and 30 minutes to social studies on a given day, skipping science and music. This method of scheduling is easier in many ways than the smorgasbord. Students are not given as many choices, and conflicts are not as common. In fact, this is how the first daily schedule of this type got started in 1963 at the Canyon del Oro School.

12. Another question relates to size of school. Any size school can build daily schedules, but compromise must be made depending upon logistics, available manpower, student requirements, facilities, and other. In large schools of 1,000 or over, schools-within-a-school or "house plans" have proven to be the easier way. Units of 600 are better for schools, so in a high school of 3600, four units of 900, six of 600, or three of 1200 make more sense than one of 3600. Scheduling 600 provides no difficulty, but the logistics of 3,000 do present additional time problems in developing such a schedule. In small schools of 200, the logistics are quite simple, but there is less flexibility because of the small numbers of staff.
13. Any age level can benefit from a daily schedule. Open schools have pre-kindergarten through 12 students involved. The only difference is that there is more planning and structure of the 3's, 4's, 5's, and early 6's, but even for them it can be a very open permissive program; of course, as much structure as a staff desires may be built in on a daily basis.
14. Cost is related to the amount of paper and ditto masters used and for the man hours needed to build it. However, eight years experience with daily scheduling is convincing that the advantages far outweigh the disadvantages. Further, and

is around the corner via the computer. We now know how to build a daily smorgasbord with a computer and will switch to that system as the computer becomes available through big districts, colleges, intermediate school districts, cooperative intradistrict projects, cooperation with local businesses, and many other such potential resources. A few schools are already planning or making pilot trials on the new third generation computers. The proposal is to feed into the computer on a daily basis the various requests and have the machine print out a brand new menu each day the school is open.

15. The teacher request sheets that now are used in most schools for daily hand scheduling look something like the model presented below. Further refinement is planned as sophistication develops.

Name _____ Team _____			Date _____	
Experience or Group	Amount of Time	Room Request	Special Needs	Remarks

16. The final schedule generally looks like this at the moment, though variations again are planned for the future.

ENVIRONMENTAL CENTER									CREATIVE CENTER								
	10A	10B	11	11A	12	13	14	15		16	16A	17	18	18A	19		
9:00	Open Lab	Indian Cult.	1-1 Conferences	Open	Conser.	Closed	Animals planes	F. G. Drug Movie									
9:15				Chem.													
9:30		C.W.P.		Open	Z's	Ind. Study											
9:45																	
10:00		Open		Conferences	Open	Z's	Ind. Study	Animals planes	F. G. Drug Movie								
10:15																	
10:30																	
10:45	Open Lab	C.W.P.	1-1	Open	Z's	Ind. Study	Animals planes	F. G. Drug Movie									
etc.																	

Daily smorgasbord scheduling is an exciting, practical, effective, and far better way to schedule than the conventional methods. Scheduling itself is only a tool, but without getting rid of the old traditional organizations, real improvement is limited. Thus, scheduling opens existing horizons for creative, innovative faculty and students. Though present schools may modify their current daily scheduling techniques, they would not be willing to return to the old methods of scheduling. It is not unusual, for example, for a daily scheduled school to make over 100 major modifications in their first two years of using the daily scheduling concept.

Visitors constantly ask: "Is it really worth all the fuss and bother? Is the schedule really that much better?" The answer is to generally ask them to remember that in the early 1880's, Peter Cooper's first railroad engine was beaten in a race by a horse. In the early 1900's, Billy Mitchell was court-martialed before the concept of airpower was accepted. People laughed at the Wright Brothers and other early pioneers who did crash once in awhile. Eddie Rickenbacker type pilots had to fly planes of questionable quality. The Spirit of St. Louis was also a gamble. The P-38 met a need, but only for two years; it was soon replaced by jets. Now we have 747's and Apollos. Educators must decide whether or not they want to continue to send mail by pony express and travel across country by stage coach or iron horse, or whether they prefer to send by airmail and fly cross-country in jets.

Daily smorgasbord scheduling is now beyond the Peter Cooper and Wright Brothers stages. It is, however, probably no further along than the Spirit of St. Louis; but one day smorgasbord scheduling will be a space rocket for education. In the meantime, we hope that educators will be encouraged enough by the present successes to help develop the philosophy and mechanics to a point where nationally educational scheduling will at least soon be in the advanced jet era.

For staffs not yet ready to try daily smorgasbord scheduling, further explanation of the rationale behind major schedule changes is still needed, along with investigations of other possible alternatives. The key concern here is not what "model" a particular school buys, but that the school moves out of the 55 minute period, or flexible-modular, or self-contained approaches.

The educational leaders in the school must be committed to the notion of developing more sophisticated scheduling or no recipe will work. The principal, for example, must be willing to become involved in the extra work and frustration that accompany massive scheduling developments; he must also be willing to break traditions.

In planning a new type of schedule, the leadership must ask whether to involve all of the staff or just part of it the first year. In a new school constructed especially for teaming and innovation, generally the entire school should adopt some type of flexible scheduling. However, if the new school is not an open attendance area, part of the school should remain more structured; if it is a large school, built around the house plan, one "house" could remain more traditional while the others became "open" in varying degrees. If it is an old school with established faculty and clientele, the principal probably should work the first year to involve only thirty to fifty per cent of the liberal element of the staff in variable scheduling, through use of the school-within-a-school concept. The middle-of-the-road group can watch and get involved slowly while the resisters can be left alone for a year or two. Remember, in the development of commitment, the administrator cannot do it alone. He must surround himself with a portion of the staff who are also committed to the implementation of scheduling innovations.

For those on the staff who still need convincing, the leadership group must "sell" a rationale which mandates that the schools of the future must arrange for organizations and schedules built around entirely different assumptions, such as follow:

1. Not all teaching jobs need be the same.
2. All classes in all subjects need not meet every day.
3. All classes need not meet the same number of periods per week or the same amount of time each day.
4. Students are capable of assuming responsibilities.
5. Learning is more important than teaching, and learning can take place without the teacher.

6. Substantial improvement must take place in the instructional program, and the teacher has an obligation to try to invent and experiment with ways to improve learning opportunities and experiences.

If a core of the staff becomes committed to the possibilities of variable scheduling, that nucleus should read much of the available literature related to flexibility. During this reading they should try to answer basic questions: "Why have daily teacher-controlled variable scheduling? Should we adopt smorgasbord scheduling instead? Why would either be better than what we are doing now?" The answers that a staff would reach in posing such questions are generally summarized in the next few paragraphs.

As indicated earlier in this chapter, currently most schools still operate on a bus schedule. The central office determines when the buses arrive and when they can leave. The principal does divide the day into six periods and lunch, based upon bus times. Then he says to Mrs. Jones, as she returns to school that fall: "Mrs. Jones, you have the most wonderful schedule; you are going to have World Literature first period this year. This means you are going to have twenty-five students, five days a week, fifty-five minutes each day for thirty-six weeks. You cannot have any more than twenty-five because the schedule will not permit it. You cannot have any less than twenty-five because we do not have any place to send them. You cannot have any more than fifty-five minutes because that would interrupt second period, and you cannot have any less than fifty-five minutes because that means we would have too many students uncontrolled during the day. You just enjoy yourself and have a good time with these twenty-five every day." The teacher then goes into the room and says, "Isn't it wonderful, boys and girls? This year the twenty-five of us are going to be together for fifty-five minutes each morning for thirty-six weeks. We are going to have a wonderful time studying World Literature. Won't our schedule be exciting?"

As she prepares her course, her basic question is focused around "What can I do tomorrow for fifty-five minutes to occupy the twenty-five students?" She should be asking, "How may I help students learn tomorrow? What is the best size for the experience? What length of time would be best? Would it make any difference whether held in the morning or the afternoon? What room would be appropriate and how could we evaluate the program?" In other words, the consultant and students should be completely free to determine whether they want to meet at all that day, whether five or one hundred and fifty students would be appropriate, and whether the time should be an hour and a half or only thirty minutes, in either a large group, laboratory, or seminar type room. These decisions should be up to the learning situation and the various teams on a daily basis. It should not be determined by the teacher or administrator in the spring or summer preceding the school year. In conventional scheduling the administrator is saying that he can predict what an individual student needs the following April; yet he makes his prediction the previous April or at the latest, during the summer. He determines then that nine months later the student should be meeting fifty-five minutes from 8:30 until 9:25; the greatest tragedy of all this is that in the case of a transfer student, he has prescribed a remedy before he has ever met the patient. There is no defensible position for this soothsaying kind of rationale. A staff wanting to consider a flexible schedule must read the literature and learn the types of possibilities and the philosophies behind them.

For example, as the staff reads about different kinds of scheduling, they must consider the type of program originated at Stanford, at Indiana, at McDonnell,

and many others. They should ask, "What is wrong with the flexible modular program?" The answer is that nothing is wrong with that program if it is compared only with the bus schedule described above. The flexible modular programs are so much better than traditional scheduling that everyone should be scheduling with this system if that is the best step that can be achieved in a given district right now. On the other hand, the flexible modular schedule has various flaws; it is really an inflexible-flexible schedule, but it has been a way for many schools to start. The problem with the modular schedule in most schools is that there are only five master schedules. If teachers look at their schedule one day in April, they often say: "Why last April did we ever request this kind of program? Look, we have large group tomorrow, lab on Wednesday, and small group on Thursday. We wish we could change it." With a daily teacher-controlled variable schedule or a daily smorgasbord, it would be possible to change. Locked into a bus schedule or an inflexible-flexible schedule, it is almost impossible to make wholesale alterations easily each day in most schools.

Developing a philosophy is a step which is absolutely necessary when making provisions for flexible scheduling. The teachers and administrators in the particular school must study carefully the advantages and disadvantages of this kind of scheduling, and then determine whether or not they agree with the basic philosophy. Do they really understand how variable scheduling provides daily flexibility in that the schedule can be changed to suit any particular need on any given day? Do they comprehend how variable scheduling relieves boredom? For example, an outgrowth of daily scheduling, which was not necessarily one of the original reasons it was developed, is that students and teachers constantly have said that school is much more interesting "because I do not have to sit in that World Literature class from 8:30 to 9:25 every day." One day the student may have World Literature class from 8:30 to 9:25 every day." One day the student may have World Literature at 8:30, one day at 2:30, one day when he chooses, and one day not at all. Variable scheduling does relieve monotony as students self-select each day their attendance and study patterns.

Variable scheduling also makes time a tool. We must learn to use time wisely. Students and teachers are no longer locked into a fifty-five minute period or a self-contained room schedule which requires reading every day or music always from 2:00-2:30 MWF; they enter a situation where they can control their own time. The teacher may ask for only thirty minutes; the student may have a choice between eating doughnuts for thirty minutes or studying. Both adults and youngsters must begin to learn to use school time as a tool in providing for better learning opportunities.

Variable scheduling provides time for planning. Team teaching, time to dream, and interaction among professional staff are important in a flexibly scheduled school. Teachers need to sit around a table sharing interests, abilities, and knowledge; they maximize strengths and minimize weaknesses; thus flexible scheduling leads to the elimination of rigid requirements and self-contained rooms in the elementary school. If we believe in the concept of individually prescribing instruction and operating in a big barn philosophy, then there is absolutely no rationale that calls for departments in secondary or self-containedness in the elementary schools.

Do not fail during this study to create dissatisfaction. One of the areas that administrators and teachers have overlooked in planning to implement variable scheduling is that students must be involved; they make or break an innovatively scheduled school. If the students understand the why, what, and where, as related to the process of scheduling, if they become dissatisfied with the old structure, and if they agree with the new philosophy, generally the new attempt will be

successful because they are so sold on it themselves. In order for change to occur, we must be dissatisfied with the present schools; we must be committed to try to find a way to improve. One of the possible ways to improve is to adopt the concept of daily scheduling. One of the really big dissatisfactions in schools deals with their past inability to truly individualize instruction and learning, and truly personalize student programs. If staffs become dissatisfied with group-paced instruction, it is not too hard to implement forms of individualized, continuous progress, self-paced approaches which force new scheduling procedures.

For those schools not yet ready to adopt daily scheduling, other alternatives ought to be considered. Each school can develop their own model. There is no "one way" to schedule. The following summaries of some of the other types now available may be of help to a school wishing to strike out on their own and develop an entirely new or modified approach to suggestions in this chapter.

One of the seven or more alternative ways to build a schedule at the present time is to use a computer program based on modifications of the original GASP system--better known now as flexible modular scheduling. As previously mentioned, groups such as the McDonnell Automation Center, the agencies which have taken over the Stanford system, Indiflex, and General Electric are examples of companies which can build such a schedule. Here requests are put into the computer and basically five master schedules are derived for the year. This is one way to build a type of flexible schedule.

A second way to build a flexible schedule is with the use of keysort cards, particularly those developed as the Royal-McBee Company Keysort System. Generally, a scheduling coordinator and scheduling clerk are needed for this type of mechanism; students' schedules are placed on keysort cards. The schedule can be built daily, weekly, or on a semester basis.

A third way to schedule is with a schedule board, some type of identification tags, and a clerk. Teachers turn in their requests to the clerk who builds the schedule on the basis of these plans. In other words, a schedule request sheet job order is turned in each day on which the teachers tell the clerk the amount of time that they desire for that particular day for the group that they want. They may also turn in any special requests they may have such as the room arrangement, audio-visual materials, and other. The clerk then takes all of the requests from the teachers and builds a schedule.

A fourth way to build a schedule is to form scheduling teams. They may organize in a number of ways, but it usually involves a large block of time during the day. They can be arranged on an interdisciplinary team approach, or on a disciplinary team approach. They can be on a grade level or non-graded level arrangement, but the general plan here is that a number of teachers with their aides are given a number of students and a large block of time; within this block they build a type of flexible schedule.

A fifth way is getting involved with the latest technological developments. There are presently new techniques in the keysort approach mentioned previously, but the technological effort that is leading the way currently is the one described earlier developed at Brigham Young University. Their laboratory school was the first in the United States to have a daily teacher controlled flexible schedule built with a computer. The program is still available and is the method which holds, at this writing, most promise for the future of those schools desiring the best possible forward looking technological system.

A sixth way is a combination of the methods discussed in the previous five. In other words, one school may have part of its schedule built daily by the computer, another part through the block of time arrangement where teachers build it themselves by hand, and a third part of their school schedule built in a more rigid fashion by the Stanford-type computer arrangement, or an offshoot of the old bus schedule built by hand to accommodate those teachers who still insist on rigid, constant arrangements. There are thus all kinds of possibilities in building creative schedules.

A seventh type is the daily variable schedule, one which usually leads to the adoption of the daily smorgasbord approach. One of the secrets in making this work is to have very few "must" classes. In other words, teachers should not request students five days a week. There should be very few large group classes. A guideline is that one large group a week is too many in the majority of classes. This does not mean that students are not expected to see the consultant more often; but when an adult determines there is need for a specific group on a specific day, she should be able to request it. Generally, the teacher requests open lab which cause no conflict in the schedule, or individual conferences which again cause no conflicts. The teacher may also leave students open for independent study, or request small groups, they normally can be easily scheduled. Part of the key to this type of scheduling is to request "classes" of no more than five or six students, and all with optional attendance; "must" classes must go.

From this framework comes the smorgasbord which is basically just that--the kids are offered ham, pork, turkey, chicken, several kinds of salads, several kinds of potatoes, rolls, and desserts. In terms of educational subjects, what happens is that the few large group requests are scheduled throughout the day. The rest of the time the teachers merely indicate what is available to the students at that particular hour. For example, under one column may be listed an open lab, then individual conferences, then open lab again, and then a small group discussion with some closed time in between. Each consultant has similar kinds of offerings throughout the day. There is little conflict because the students come and go to these areas as they desire on an optional basis.

This type of scheduling is not philosophical or theoretical; it is a practical successful way of developing programs for students. Once the instruction is individualized and personalized, and once the students have learned to operate under the concept of freedom and responsibility and open classes and open campuses, the schedule is an exciting tool. It enables students to choose each day the kinds of activities that make sense to them. On a given day a student may spend all day in the art lab, or industrial arts area, or in the media center, or the student may divide up the day and spend two hours in home economics, half an hour in English, an hour and a half in math, and other similar combinations. The key here is that the students select where they want to go and what they want to do. Even the large groups should be optional. This works on a K through 12 basis. The only difference is that there may be a little more structure offered in the lower years, and sometimes they may not have an open campus, especially if they are in heavy traffic areas. The pilot programs with daily smorgasbord scheduling have been tremendously exciting and hold great promise for the future. Several schools are now using this method. The suspect is great that non-scheduled schools will be emerging as more develop open, student selected curricular experiences. Alternative eight, then, may soon become a school without a schedule; only special events will be listed, and even these probably will be eliminated. Already some of the daily scheduled schools have cut out listing independent study and open

laboratory times. Some have tried no schedule on Wednesday, for example. Several schools are now only listing special events. But as pilot programs develop in a truly open school, free from pressure of parents, colleges, and subjects, the schedule will disappear too.

In changing to new scheduling procedures or any of the other innovations, the question of money always arises. Yes, schools need more money, but the present problem is to use the finances we have more creatively; to do this we must reallocate resources. In other words, in 1967, if a school spent \$50,000 on textbooks, two teachers, blackboards, and paint for the walls, maybe now they will spend the same \$50,000 on a video viewer, one teacher, three aides, an overhead projector, and will knock out a wall. Schools can have flexible schedule on their current budget. What they must understand is that the money that is spent by the school district must be reallocated and deployed differently than in the past. We are not talking about an impossible financial arrangement; too many schools around the country have already proven this.

Thus, in considering budgets and the eight alternative means of scheduling presented here, educators must realize that all are practical and immediately possible illustrations. The arrangements described in the following paragraphs further portray the reasonableness of such efforts and are examples of how schools can begin if they must start schedule breakthroughs in a rather conservative manner.

One method, the block of time arrangement, can be illustrated as follows: Perhaps six teachers--maybe two English, two social science, two science teachers--and three aides are given 210 students for a three-hour block of time--the equivalent of periods one, two, and three. The rest of the school can operate traditionally; the 210 students are completely free to organize a program as they desire. At a given moment, all 210 may be working individually, or some may be working in a large group with one teacher, or all may be working in small groups, or some may be working independently, some in laboratory situations and some in informal groups. Whatever they are doing has been determined daily by these students and teachers who are responsible for their own time. The schedule on a given day may call for about an hour of the student's time scheduled with a consultant; the other two hours may provide opportunities for most students to determine the work best suited for their immediate need. Their choices may be related to English, social science, or math. They may choose not to do any work in these particular subjects, but instead go to the student center for a doughnut, to the art room, or to the physical education building for a workout. In other words, these adults and these students have complete flexibility during this team arrangement to build the kind of program that they desire. If the physical education teacher won't cooperate, then one of the options is just not available until that department is convinced to be more open.

Another arrangement might be combinations of alternatives. For example, one team may have four hours, or sixteen modules, if the schedule is built on a fifteen minute module base; this gives them a big block of time similar to that just described. Right opposite them might be teachers who have back-to-back schedules for horizontal, but not vertical, flexibility. In other words, they may not have four hours and 100 students with four teachers, but there may be two or three teachers working for an hour, or 75 minutes, or for some other time arrangement. An example of this might be if three math teachers have a group of 90 students to work with for an hour. They can have horizontal flexibility working as a team with options for large or small groups, independent study, and other flexible arrangements.

At the same time that some of the teachers are involved in this big four-hour block and others are involved in horizontal arrangements, a third group of teachers may be on a regular conventional schedule. However, to show them that there are other ways of teaching besides fifty-five minutes, or to provide longer and shorter periods of time for subjects that may demand them, the former first period for those on a conventional schedule may be sixty minutes one day, seventy-five on two days, and forty-five minutes on the two remaining days. In other words, the conventional schedule can be varied too.

At the elementary and middle or junior high levels, there is absolutely no excuse for not having a daily variable schedule. As soon as one eliminates departmentalization in junior high, and self-contained rooms in the elementary school, there must be plans for some type of daily movement of students in order to retain the desired flexibility. The easiest way in the elementary school is to form teaching teams which can operate within large blocks of time, building daily schedules themselves. For example, four teachers and three aides may be given 125 students all day long; these teachers and their aides would teach all the subjects for these 125 students. In other plans the teachers may teach all or some of the subjects; one teacher may teach eight subjects in the elementary school (not recommended, but possible), or she may only teach two or three subjects. There can be larger teams within which are then developed sub-teams. There may be eight or more teachers in the school; each one may become a specialist; students are moved from teacher to teacher, not on a departmentalized junior high type basis, but growing out of the team plans where a series of specialists work together to help individual students. None of the above are considered the best way, but they do illustrate how small, practical starts at more flexibility can be made overnight with the same budget.

Ultimately we are coming to the day described earlier when in most of the larger schools, computers will build the high school and middle school schedules on a daily basis, and where some schools-within-a-school will operate with no schedule. Smaller schools and most smaller elementary schools will probably continue to remain for awhile on some type of block of time, teacher constructed approach, which is a simpler type of arrangement for building flexible schedules in small schools and in poor districts where they have not formed intermediate districts to provide computer availability. The main point to be stressed is that daily flexible scheduling is just as easy as building a traditional schedule if one has a commitment to the philosophy and begins to non-grade and individualize. The coming of daily smorgasbord scheduling and "non-scheduling" is already revamping the forward looking daily variable schedules.

However, in order to really significantly change the time organization, requirements must change. For example, in building a high school flexible schedule, as soon as the teachers adopt an open philosophy with very few demands for groups, it is easy to create imaginative schedules. If the art teacher has primarily open labs and perhaps only occasionally requires a group, if the typing and industrial arts teachers basically do the same, and if the social studies teacher demands no more than one large group every two weeks and perhaps two small groups a week, the schedule is relatively free. The math teacher can work primarily on an independent basis and, therefore, have almost no demands for large groups of students. When this becomes the method of developing curriculum, teaching, and learning strategies, then the schedule becomes a relatively simple matter. Presently the reason for the Stanford type schedules is that we are so locked into group-paced instruction and are still so often seeking to meet the group of twenty-five or to teach as if there were twenty-five, that we miss the entire possibility of exciting educational benefits.

In building daily schedules, whether variable or smorgasbord style, the student rarely, if ever, has the same schedule. He has 170 or 240 or one for each day he attends school each year. The consultant in this particular program may find herself "teaching" on Monday; Thursday she may find that she has the day off to dream. In other words, because team teaching and flexible scheduling allow schools to release at least 25 per cent of the faculty on any given day, some teachers are usually scheduled out. Part of the reasoning for daily scheduling is to provide this kind of potential for the teacher.

Thus far the best way to learn to schedule is to build them. It takes most schools an entire quarter to train all the teachers, and even then they do not all understand it well. After two years, a schedule for 600 can be built each day in about an hour unless unusual problems arise. The first efforts in most schools though, usually take all day, and after two years, schools still have mechanical and philosophical scheduling disagreements.

Some educators, though, continue to ask: "Where are we in this whole process of flexible scheduling?" Some have thought they should not adopt flexible scheduling because it did not do for them what they wanted it to do; they are looking for a panacea, the Shangri-La. We are not at that level of development in flexible scheduling, individualizing instruction, or providing for student freedom and responsibility. We are not there in any of the 69 revisions that are summarized in the glossary, but we have made great strides the past ten years in each of the areas, and have gained the confidence to try to implement these changes.

Returning to the airplane and train analogies, schools have a choice of staying in the pre-airplane stage--they can be content with the horse and buggy or the old iron horse--or they can choose to try to fly. Some have not been content with the old iron horse; in terms of organization, they are attempting to play with scheduling, just as earlier pioneers did with the notion that an airplane would fly. Those first efforts were not very successful, and neither were the early attempts at flexible scheduling; but at least the attempt was made. Now that we have arrived at the Spirit of St. Louis stage, unfortunately just as the air industry was forced to do, it looks as if we now must struggle through the educational counterparts of such propeller driven fighter planes as P-38; remember how excited we were during World War II to learn that the P-38 flew 400 miles an hour; two years later the arrival of the initial jets put the propeller fighter plane into obsolescence. In the 60's we developed the present jets; now in the 70's it looks like supersonic airliners, and maybe in the 90's it will be passenger rockets. We are even learning to parachute planes safely to the ground. Where is the aircraft--or rocket--industry going after the year 2000? Once schools have a supersonic method of scheduling, hopefully before the year 2000, educators can ask the same question--where are we going? In the meantime there is no doubt that most all educators working with forms of variable scheduling are at the present apprehensively optimistic.

If schools or districts do develop more humane approaches during the 70's, it is a safe bet that the more open schools will be operating without schedules and thus can skip this entire chapter and a great deal of work. More and more open concept schools will move from a modular scheduling approach to the daily smorgasbord. Almost all schools will be involved in some type of scheduling they regard as "flexible." By 1980 no good high school will still be operating a six or seven period day. Technological advances with the computer, philosophical acceptance of open schools, and humane approaches toward curriculum and persons will lead to exciting new concepts in the area we now refer to as scheduling. In fact, the word schedule may become one of the extinct words, and thus eliminated from the educational vocabulary.

Chapter 12

Freedom, Responsibility, Courtesy

Humaneness and relevancy may be key philosophies in creating a new, open responsive school, but the mechanics of how to do it rest with one basic slogan: "With Freedom goes Responsibility and Courtesy." If schools are not willing to practice the concepts implied, then change to a more open system is extremely difficult if not impossible.

Students should have a great deal of freedom, but must learn to accept the responsibilities that go with self-direction, and the courtesy that must be extended to others. Making decisions and value judgments are important. These are not learned without opportunities to exercise these goals.

In the past such ideas as student freedom, responsibility, and daily scheduling have been barriers to change in that the faculty, administration, board, and/or parents would not approve the program; they feared that students could not accept great amounts of freedom; the adults thought they would waste time, get in trouble, and not "learn as much."

Fortunately, in recent years a number of schools have been successful in developing models for use of unscheduled, open, or unstructured time. They have shown that the concept of responsibility does work, that it is an exciting philosophy, and that it is the kind of program that should be available to many of the students most of the time. The trauma of turning students "loose," and the mechanics and time necessary to build daily schedules have certainly been barriers to improvement. Two constant questions arise: How does a school overcome such barriers? What kinds of models are there throughout the country for a staff to consider for adoption or modification?

In overcoming barriers and developing for a specific school program related to freedom and open scheduling, both the students and staff must understand the "whys, whats, wheres, and hows." Not knowing about the change from A to Z causes resistance. Teachers and students must understand the why factors, such as why we build a daily smorgasbord schedule. They must understand that the philosophy of daily scheduling calls for time arrangements based upon the learning task as determined daily by teams of consultants interacting, or by student requests, or a combination of both. They must know that schedules attempt to provide for the abilities, needs, and interests of every student on an individual basis each day. Further, they must realize that the schedule, and the concepts of freedom and responsibility, are trying to make appropriate utilization of time, space, professional staff, and materials. They also must know how they can make requests and selections regarding the daily programs.

The what factor becomes involved in two phases: one we could define as teacher scheduled time, and the other as student scheduled time. Most schools have been afraid to attempt unstructured schedules, but those who gambled have provided excellent models. The teacher scheduled time should usually occupy no more than 20 per cent of the day and will probably be less in the future. In several current optional attendance schools, time is generally by student choice, not teacher demand. Even in required attendance situations, where the teacher can demand small groups or large groups, laboratory sessions, or individual conferences, she or he may

control time to the point that in the continuous progress, self-paced, individualized instruction arrangement, when there is a need to work with an individual, the adult may ask for that individual. When the consultant desires a laboratory experience for the student, it can be arranged, the same as students can be scheduled for small or large group situations.

The major portion of the year could be defined as student scheduled; at least 80 to 100 per cent of each day most students should be allowed to determine what they need to do with their time. The student should not be controlled by the authority of the teacher all day long, except in necessary cases.

What can an individual do during the time that is student controlled? There are many things; he can become involved in quest study, pursuing something on his own that he has developed; he can be involved in depth study, providing more detail in work growing out of a program partially prescribed by the teacher. He can be doing some individual study which might be the equivalent of the assignments that we have given him in the past. He may be involved in some type of other independent study project relating to one of his classes or relating to his own special task. For example, he might be the only one in school taking Latin American History and may be working independently during this time on this course. The student may be working with a small group; he can either organize it with other students without a teacher, or he can request a small group with the teacher. In other words, the student may request meetings with teachers, either as an individual or in a small group, or even in a large group. If students feel a need for some particular help from the teacher, they can receive it, generally on the day it is needed. On the other hand, they might be involved during the time they have in some kind of student activity; they may be relaxing, eating a doughnut, working on the school newspaper, or enjoying some other area that may not be related specifically to a subject being studied.

Both students and teachers must understand where the students may go during the student scheduled time. These areas, for purposes of explanation, can be divided into two types: study areas or activity areas. In other words, some students may be involved in what adults call good learning situations, working on some kind of class or independent project. Others may be involved in something that may not be directly related to the prescribed classroom program, but something that the individual student feels is of benefit. There should be from ten to twenty-five different choices available to students, depending upon maturity and facilities. These apply to first-year boys and girls as well as to seniors. Students in a true open school need not account for this time; they may decide where to be without accountability of attendance. When they must be "somewhere," accountable to attendance rolls, the concept of freedom loses much of its potential.

A student might choose as one of his twenty-five possible selections today to go to the media center to study; he might choose the student center--the so-called student union, or lounge, or doughnut shop, or faculty/student snack bar or whatever name it might have. He may choose to go to a laboratory where individualized reading is established, not on a remedial basis, but as part of an approach that calls for most students to improve reading by participating in the program sometime during the school years. The student might be involved in another classroom session; he may decide to repeat an experience that he had previously and would like further clarification. He might go to the industrial technology laboratory and work on a project there, or he might be in the cafeteria, or the counseling center where he could visit with the counselor or read descriptive college or vocational selections. He might have a conference with an individual teacher; he might be involved as a

student assistant working in the office, media-center, or some other area; or the student might go to the art studio.

Ten areas already have been described; the eleventh could be an open typing laboratory. Most every student of any age should be able to type whenever he has a need. The student could go to the outdoor center, a place where students can lounge or relax or study outdoors, or to the home economics laboratory. He could work on a school project such as the newspaper or the yearbook or be working in the science laboratory independently; he could be in a committee meeting of some kind. A student needing structure could be assigned to a teacher or an area where quiet study is occurring, or he could be helping that adult as part of the therapy. Another could choose to be in a listening facility such as the language laboratory, or he might choose the physical education lab. He might go to an evaluation center where whenever he is ready in his individualized self-paced program, he can take the evaluation on the particular day and hour that he desires. He could be in the music studio. We could go on and on pointing out places where the students could choose to be during the time he builds his own schedule.

These are not theory, and they are not philosophy; there is room for these choices even in crowded buildings. It becomes very feasible when the students and teachers overcome the notion that they must meet in the teacher's own room with twenty-five students every day. As soon as the teacher realizes she does not have "her room" and "her students," but instead is working as part of a total school approach, and when she works with individuals and not group-paced instruction, these activities and choices become very appropriate.

One of the reasons for unscheduled or responsibility time is to help students develop the concepts of leisure and responsibility. The future world is going to leave adults with large amounts of unscheduled time. We are basically going to select from three broad choices: we can involve ourselves in study, service, or recreation. Some of the free time ought to be spent studying; self-education and life-long learning are going to be much more important in the future world. A second avenue for use of unscheduled time is that of service; more and more we are going to offer services to volunteer understaffed state and private agencies. Part of the time will continue to be spent in recreational activities. In schools where choices are allowed most of the day, the students gather experiences in a controlled environment in making decisions and in wise use of time. They learn that with freedom goes responsibility and courtesy.

This entire concept is so terribly important that it is of value to take time here to further explain and illustrate how this attitude toward the student works. It is necessary that the innovative schools understand student freedom and responsibility; it is applicable in suburban, urban, and rural schools but is implemented differently. In a "problem area," schools might only give a small percentage of the students these opportunities in the beginning and let the list gradually grow. Responsibility cards can be issued, for example. In an area less troubled with problem learners, all 100 per cent can be released, although about 20 per cent need to eventually be structured for a time before they gain complete understanding of the program. Usually the "problem learners" are caused by the "problem schools"; eliminating the latter does much to remove the former. It is a two or three year process in difficult cases or situations, and sometimes no cure is discovered for or by some individuals.

Schools embarking upon innovative, exemplary programs must accept this basic concept--one which is greatly in need of correct implementation--that of allowing

students opportunities for freedom and responsibility. If educators believe that a prime purpose of schools should be to develop decision-making, responsible, value judging, perceptive, self-directing, self-educating individuals, then time must be provided for students to have opportunities to develop these skills. This statement applies to both elementary and secondary school, to "first grade" students and high school "seniors." The only difference is in the degree and method of implementation.

There are two important reasons for the acceptance of the concept of freedom and responsibility. Foremost is the philosophical belief in necessary goals for education; second is the fact that if a school decides to implement a truly daily variable schedule, it is virtually impossible to program all students 100 per cent of the time. In past efforts to account for all students, the obsolete concept of a study hall has been employed in the secondary school and constant teacher-pupil contact in the elementary. Fortunately, educators are realizing that the study hall offers little value other than as a "jail" where attendance can be taken, thereby accounting for all students' actions almost every minute of the school day.

Students need to learn to use time as a tool. Being tightly scheduled for six periods a day at school with no optional choices does not lend itself to aiding students to make judgments about appropriate use of time. Schools of America have grown to be dependent upon organizational processes that are more nearly intent upon managing students than educating them.

Most schools now are run on a 90-10 basis--90 per cent of the decisions being made by teachers, and 10 per cent by students. What is needed is a more nearly equal relationship. This is not to imply that schools be managed by young people; it does, however, intend to suggest the need for joint adult-young person considerations of school programs, not in theory, but in actual practice.

Under the old secondary school concept of study hall, or assigning students to six classes, or in the elementary school of allowing children only a short recess, the only times students could make choices independent of the teacher were at lunch; these were limited to a few areas for short periods of time. Students have wants and needs as do adults. They ought to be able to decide during part of the school day what they would like to do--what would be most meaningful to them at a given time. The administrator or teacher cannot during the summer or on a day-by-day basis, decide what is best for every student every hour of every day. Students need to be "turned loose" part or all of each day.

How is this idea implemented? In the elementary school most students should have a chance each day to make decisions. Smorgasbord scheduling makes almost the entire day a choice; however, in most conventional schools, responsibility time should provide some opportunity for the students to decide at various times during the day whether this moment should be spent in the media center, on the playground, in the cafeteria having a snack or talking to friends, in the art or science centers, or in the open pod or classroom working on special interest projects. First-year students, in general, may have less time than sixth-year students, although at all levels individuals may have more or less time depending upon their ability to accept responsibility; some may make decisions all or a greater part of the school day. Schools which have done this have discovered, much to the amazement of the skeptics, that students can make wise choices and can be away from a teacher and still learn to read, write, compute, think, analyze, observe, draw, sing, and jump. The "crowded" elementary school curriculum takes on a new dimension with the decision-making

element added. First-year students can self-select all day long, though in the initial weeks of the program part of their day should be structured to provide some group orientation in each area plus security for those who need it.

At the secondary level, at least twenty-five areas, as mentioned, need to be identified as options for selection. Depending upon whether the scheduling development is of the daily variable or smorgasbord type the students may have one, two, or six hours of unscheduled or responsibility time. Many students should have a choice of attendance in most classes. In fact, forward-looking schools accept the concept of optional attendance for most all students; those who have experimented with this have found that students will attend classes where teachers have developed programs that are meaningful and realistic for the goals of the learner. Students shy away from classes oriented primarily to teacher goals. Self-selected curricula motivates students.

For student-selected options, remember that a patio, a snack bar, the cafeteria, the media center, the art and music rooms, the shops, home economics area, science laboratories, physical education areas, typing, reading and writing laboratories, the counseling and testing center, an appointment with a teacher, repeating a class for further clarification, school activities (newspaper), and a quiet space should all be available. In these choices there must be a mixture of quiet areas such as individual carrels in the media center, semi-quiet areas such as the lobby or rooms where students may work together in small groups, and noise areas such as a patio and snack bar where students may talk in normal or loud tones.

There are some built-in brakes in such a program. The students are taught that there are only twenty-five areas, not twenty-six or twenty-seven. They receive further explanation that with freedom goes responsibility and courtesy; in a society there are necessary restrictions. An analogy may be made with driving a car, which one may freely do as long as speed limits, traffic lights, and road courtesies are observed. When traffic signals are violated, perhaps nothing happens the first time. Maybe the second time a ticket is received, but tragic results might occur the third time by running down a pedestrian or hitting another car. Students must understand that in most schools climbing on the roof and hitting the teachers are not among the possible choices. Open campuses are advocated in flexible schools, but in some situations a closed campus may be better.

Students generally fall in four broad categories as regards functioning in this type of program. The first year that it is attempted: (1) the majority of students handle the entire program beautifully, (2) some handle it well but need an occasional prodding, (3) several handle parts of it but need to be structured into some classes for part of the day, (4) there are a few who generally need structuring all day long; at this stage of their maturity they are not able to handle much unscheduled time. By the end of two years in this program, most students fall into category 1 or 2--about 98 per cent in a rural or suburban type school and about 60 per cent in the inner city.

Students who fall in category 4 can usually be subdivided into two types: (1) those who are fine citizens but who for one reason or another at present need a highly structured program; (2) those who are poor citizens who abuse the opportunity of freedom. For the former, assignment to a type of structured schedule developed each morning by the student in conjunction with his teacher-counselor usually will suffice, while the student gradually learns to make decisions. For the students who abuse the opportunity of freedom, a tighter structure must be provided. These

students have usually lost communication with adults and need to be helped back into communication; the best way is by assignment to an adult they can relate to. A program is necessary to guide them to be able to accept responsibility. A planned method whereby one time they receive the "pep talk" from an administrator, one time a small group or individual discussion with a counselor or teacher, one time a session in study skills taught by a teacher, and sometimes just supervision from an aide will help most; sensitivity training has helped some. Assigning individuals to a teacher or aide often helps them most. A few students may need resource aid from school psychologists or other specialists and may spend the majority of their time in a structured program. Identification of deviant behavior and review of cases must become a part of the evaluation so that students who demonstrate a new readiness to accept responsibility can be given unscheduled time again. Attendance can be taken in an open school by carbonizing the schedules they prepare each day so that all teachers get a copy. Structuring a student's schedule usually works best if it is treated as a counseling rather than a discipline situation.

There must be a follow-up evaluation after the treatment; individual conferences with an adult who the student can relate to, along with truly personalized programs, have proven to be among the best remedies. If students are in classes they select because they have interest and ability in those subjects, and are with a teacher they can respect and communicate with, most of those who are possible to save will eventually change, though it may take two or three years for some. Usually, these students have problems in the affective and psychomotor domains which need to be clarified before the cognitive can be improved.

A specific example out of many is selected here to illustrate this message. One summer the math teachers in a school spent hours and hours going over new math programs, new textbooks, and making decisions as to the type of innovative, exciting math program needed for seventh and eighth graders. The staff chose several different programs, realizing that no one program was suited for all the students. School began, and the students undertook this wonderful math program, diligently planned by teachers with availability of all new materials.

Report cards had not yet been abolished in that school; at the end of the first nine weeks, in surveying the grades given to the students, a number had received D's and F's in math. Realizing that it must be the student's fault because over the summer the staff had just overhauled the math program so that it would satisfy all the students, the individuals receiving these grades were brought together in a group and given an old-fashioned lecture on "get busy and do your work; it is your fault that you are failing math."

The second nine weeks went along, and some of these students began to appear in the office as discipline problems. At the end of the second nine-week period it was the same story again. Generally the same students had received D's and F's. They were again admonished by the administration. In the middle of the third nine-week period, two of the boys in the traditional eighth grade were kicked out of math class. They were told they could not return. They were finished; all other kinds of threats were given, and then the math teacher marched them to the office. They were again chewed out by the administration; the kids threatened to quit school and said they could hardly wait until the end of the eighth grade when they could legally quit in that state; they only had about three months to go. What was the administrator to do? There was no value in spanking them nor especially in expelling them, because they wanted to have that happen. The staff had planned this wonderful math program, but the kids were still failing and having disciplinary problems. The students had been worked with all year in terms of counseling; their

parents had been in for conferences; finally, in exasperation, the adult working with them stated, "Don't you need any math?" The response of the kids opened a whole new world; they said, "Yes, but not the kind of math we are getting." The administrator about fell out of his seat: the kids were willing to study math, but not the school planned math; fortunately he decided to listen to them.

At that point a discussion ensued with the two boys about what type of math they needed, and a plan was worked out whereby the students could spend the next six weeks developing a horse farm on paper. They were at first resistant to this because what did a horse farm have to do with math. When they were asked if the farm would have a workout track, the reply was yes. They were asked what would be the circumference and diameter of the track, how many board feet of lumber would be needed, what was the current price of lumber per board feet, and finally, how much would this track cost? Next they were asked if it would have a corral. The answer was again yes. "How many square feet of lumber will you need, what is the price per board foot, and what will the total cost be?" They were asked if the farm would have a bunk house, and again the answer was yes.

As the project finally emerged, these students were given six weeks to complete a mural of a horse farm. They had to go to the art teacher for help in terms of painting the mural; they had to go to the drafting teacher to learn how to scale the drawing; and they had to go to the math teacher who had kicked them out of class for help in figuring the price of the project and all the other math needed, such as circumference and square feet. During the six-week period these two boys became excited about their project. The teachers, working as a team, began discussing what three teachers could do to help those who have problems; at the end of the six weeks the boys had completed a beautiful piece of work. There had been team teaching and interrelated curricula through the cooperation of the art, drafting, and math teachers. The boys then were asked what they wanted to do next because they had completed their math requirements.

One of the conditions of this project had been that if they completed it, they would be given a C in math and passed and would not have to complete the course in terms of traditional math hours. Their answer was, "We want more math." When they were confronted with, "I thought you did not like math!" they answered, "We like math, at least we like this kind of math." Other students in the school saw this project going on and suddenly desired to do this type of work themselves.

What developed from this small start was that many students developed individual math programs, many of whom were the traditional 90 I.Q. drop-out type of students. Math became fun because it became meaningful to them. They went on to learn a great deal of math and in the process inspired the teachers to develop a completely non-graded, individualized, stimulating math program for the entire school.

One of the outgrowths of the project was to understand that when teachers listen to kids and develop relevant programs based on their needs rather than requirements and programs determined entirely by educators, their whole attitude toward learning changes. These two boys went ahead and graduated from high school, probably something that would not have happened had they been required to sit in the traditional group-paced program where year after year they followed the conventional requirements found in most junior and senior high schools.

A number of schools have tried to implement the ideas presented above, but they have failed. Usually the error has been a lack of communication and understanding. Some

schools have simply announced this policy in September, talked about it a short time in an assembly, or sent out a few bulletins during homeroom, and then expected teachers and pupils to adjust overnight after years of a structured indoctrination. A carefully planned explanation must be devised to insure success.

The first step is that of individual talks with key faculty members to be sure they understand the philosophy. Then a large group presentation is made to the whole faculty as to why and how, followed by small group sessions with parts of the faculty, and individual conferences where necessary; various communication efforts must be utilized to insure that teachers comprehend student-scheduled time. For the students, sessions with student leaders are a beginning. Then large group presentations are needed; there the "W's" are spelled out: Why do you have student-scheduled time; where may you go; and what do you do when you there? Some basic operational policies are established. The three "W's" are the single most important phase of the planning. Students must understand them completely; Why do I have open time; where may I go; and what do I do when I get there. Schools with complete optional attendance and open campuses must work hard on the guidelines the first year, but the students will soon respond; they realize that these freedoms make it worth accepting the responsibilities.

Following the large group, teachers should take time to discuss the matter in small group seminars. The few reasons for putting some students on structured time should again be stressed. Then constant work in the early stages with individual students is needed. These sessions should be of counseling nature, not punitive. Students must be helped to realize that the correction, even when critical, is not condemnation. By the second year, or at least by the end of it, the need for structured programs should be overcome in most schools for the great majority of the students.

Further, faculty-student teams can be formed. These could be in the areas of curriculum, new ideas, communication, and evaluation, for example. They should meet often to discuss ways to improve the school programs. They help to get the student body involved in the mutual relationship that should exist in a school. The communication group can explain the program to their peers. The evaluation team can develop and administer student surveys to see where better understandings and improvements are needed. The idea people can suggest changes. The curriculum group can relate the new concept to teachers and students in terms of classroom assignments. These groups should definitely represent a true cross-section of the student body. Involving students deeply is the key to a successful program; they should be allowed to meet on school time.

After all this, it is still possible that some parents may object. If they come to complain saying that they do not want their children to have student-scheduled time (do not call it "free time," or "choice time" the first year), explain that it is a joint enterprise and that the teachers are standing by to consult and to guide. Ask them if Mom has a coffee break during the housework, and if Dad visits the canteen truck at the plant or office. Explain that teachers have a chance to make decisions about their use of time during part of the day, including the option of eating a doughnut. Some students have a need for relaxing after a difficult experience, or for a snack if they missed breakfast, or for studying for a future evaluation. Students should have opportunities to decide what is best for them at a given time; food service should be available all day.

Note to the parents that on Saturdays and Sundays their children are often without supervision and sometimes choose to have a snack. After all this, if parents still object, acknowledge that Pete or Jane can be assigned to a structured schedule if

the parents really feel their children cannot be trusted yet to make wise decisions. Encourage the parents to consider the child's sense of values; for example, given an opportunity to choose between a nickel and a paper dollar, the young child may select the nickel because it has a place in his "experience bank." He has held one before, and he probably knows that it can be traded for a treat. Thus, given the opportunity to be master of one's time, as a college freshman for example, he may well make a series of disastrous decisions, for he has not had the opportunity to make decisions about uses of smaller increments of time in his previous learning experiences. Most schools are organized as if it is expected that the learner is suddenly and magically endowed, about the time of commencement from high school, with good judgment about using time. The learner must have concrete experiences to be able to learn.

It is true that some students will make poor choices. Sometimes they will choose a doughnut when a book would be a better selection. Adults do the same. If students are ever to learn to make judgments, they must have the chance, and what better place than in the controlled environment of the schools. Boys and girls can gradually be given, from first year to twelfth, increasing amounts of freedom, responsibility, and decision-making situations.

Schools which have successfully implemented this philosophy have parents who say, "I do not understand it. I do not send my child to school to sit on the grass and eat doughnuts, but I like it; I have never seen Johnny so excited about school." Objective evidence being gathered in schools across the nation is beginning to bear out the subjective evaluations. The great majority of students and teachers who have operated under the old system of rigidity and then under a successful program of flexibility, given a choice, would never return to the conventional. One of the truly exciting and meaningful innovations in schools today is the entire concept of increased variability in scheduling and the dynamic philosophy of giving boys and girls the opportunity for freedom and responsibility.

Part of this barrier and model we have been discussing calls for a solution to one problem--those students who may not be completely ready at the present time to handle most of their time as unscheduled. In other words, in addition to any structured class time requested by the teacher, they may need an additional ten, twenty, or thirty per cent or all of their time structured. The most difficult cases may need some type of 100 per cent structuring, but the student should not be left structured indefinitely or without any help. The counselors should plan to work individually with these students part of the time. A sympathetic teacher can help arrange a program for students who are having difficulty. In schools where students choose their own teacher-advisor, this person is often the one who can most help the individual student.

The question of structuring some students raises the entire spectrum of the cognitive, affective, and psychomotor domains. It is quite evident that many of the problem students today have basic needs in the area of the affective or psychomotor domains, more than the cognitive, at this moment in the individual's development. Yet, schools constantly say Johnny is a tenth grader and must take tenth grade English. Johnny has generally failed most previous work and has received D's and F's in English for nine years; he hates the subject and usually grows to dislike the teacher. Still we force him into it. Some students are much better off in the entire area of personal development, responsibility, decision making, and general attitude toward school if they are taking perhaps two hours of art, two hours of individualized reading, and an hour of physical education during the day, instead

of one hour of history, one hour of English, and one hour each of math, science, and physical education. The entire structure has to be revised for these boys and girls. If we really believe in personalizing programs, we try to plan a curriculum which fits the child. Through self-directed, partially-directed, and consultant-directed courses, students are really able to pursue studies which make the old cliches become truisms--a curriculum actually geared to needs, interests, and abilities of the individuals, not the entire tenth grade as a group.

Students should be allowed to window shop as part of this philosophy; there is no need to force registration before school starts. They can indicate what they think they are going to take to help schools plan staff, space, and materials. As school starts, the students go to classes they thought they wanted. If they are satisfied, they stay there; if not, they try others. After a time of window shopping, students fill in class enrollment cards. This eliminates the need for drop-add problems. Students can drop or add at any time after this but go through a small amount of paper work so that the school has a record of the learning efforts of each student. This then helps diagnosis, prescription, and the identification of individual objectives. There is no reason to ask a student to decide by the third week of school his fate for an entire semester or year. If instruction is individualized, students can start or stop classes when it seems to be appropriate. Control is possible by requiring teacher, parent, and advisor signatures if this is felt desirable.

We can do it, we must do it--the time has come for educators to get off their duffers and start treating kids with respect, faith, and trust--as individuals--and not lock them into rigid compartmentalized schools. There is no place in schools for study halls, hall passes, required tenth grade English, and locked elementary rooms.

THERE HAS BEEN A BASIC THEME RUNNING THROUGH THIS BOOK AND THAT IS THAT CHANGE IS EASY; THERE ARE FOUR INGREDIENTS: DISSATISFACTION, COMMITMENT, HARD WORK, AND CREATIVITY. Principals ask, "What do we do without study halls or rigid attendance accountability?" The answer is: we do without the above four ingredients. Develop a recipe for each school--if schools really want to change the system. For those who want a step-by-step method, hopefully, another book will provide it. In the meantime, the simple recipe for unscheduled options is student responsibility--the students have the 25 areas mentioned above, and they can choose where they want to spend their time. Freedom, Responsibility, and Courtesy are dramatic concepts which open the way for creating exciting humane schools. The methods suggested in this chapter are still too restrictive for some persons. The completely open school-within-a-school, which will be described briefly in Chapter 23, goes far beyond these ideas in developing freedom--but a freedom still attached to responsibility and courtesy.

Chapter 13

Organizing and Staffing

Organizing and staffing for change unfortunately leads right back to that "easy way out" cliché sounding answer: each staff really must develop their own patterns. There is no "one way"; there is no "best way"; there is no "model." Innovative schools throughout the United States have tried literally dozens of different vehicles. Administrators, for example, have received numerous "titles" that sound different and usually are a better approach, but in examining the innovative schools, within a three year period these titles and job descriptions and assignments have normally changed six or seven times. Administrative or management arrangements seem stable if compared with the plans and revisions, or plans and revisions of the original plans when structuring staff teams. In addition to staffing, schools have completely revised physical arrangements as many as fourteen times in a two year period.

In other words, all agree that the old superintendent, principal, teacher in a room pattern is not a viable approach for the open school concept or for achieving change in a school, regardless of the type of learning opportunities finally adopted. There is general agreement that there must be overstaffing (in comparison with the present conventional arrangements) at the leadership level, though in a district already loaded with "Supervisors," it could turn out to be understaffing, as those persons are no longer needed in the same capacities. But in an individual school, the principal, assistant principal, staff syndrome doesn't work, nor does the concept of a superintendent and assistant superintendent in the central office. There is a strong suspicion that one of these years some recommended patterns will emerge. In the meantime, again depending upon the size of the district, the current tenured people, the present facilities, the available budgets, the amount of unionism, and all the other factors, individual districts must follow a type of hunt and peck system until a better approach is found in their particular situation.

Fortunately, however, there are some guidelines emerging. A number of books in the bibliography relating to the process of change give excellent possibilities. In this chapter, only examples of how some schools at the practical level of present involvement solved their problems in temporary, ongoing, shifting arrangements are described. We are learning that teaming is a better way to organize than a single teacher in a room; that the box room facilities obstruct improvement; that staffing like a hospital--doctors, nurses, specialists and technicians, nurse's aides, and candy-stripers--makes sense in comparison to trying to pretend everyone has equal training, experience, and competencies. We are learning that the administrative Support Team concept is better than the old hierarchy of bosses; we are learning that a school can be completely overhauled in three months, but it takes three years to build in quality, and that high staff turnover percentages affect the quality. We are learning that one model school is not enough; there must be public "free schools" as well as public open concept schools, and there must be some with balanced "requirements."

Thus the "change agents" in a given district must take some of the ideas in this chapter, not quarreling over terminology or roles, for we all know these will change and change again--but using the notions as a base--and adding to them suggestions of other authors, the complexities of the particular district, and the ideas of the creative organizers in that district, and then come up with a design which will

temporarily satisfy in that particular situation until something better can be evolved. The following paragraphs present first a general overview of the problems related to organizing and staffing educational institutions; second, specific suggestions are offered as to possible ways to start in a given school; finally, a plea is made for cooperative, imaginative partnerships to evolve as the search continues for the mechanisms through which schools can change.

Unfortunately, for years in education, particularly in the way we have organized schools, we have been going down the up elevator, or as the book and movie called it, Up the Down Staircase. Most of the criticism contained therein was justified; in fact, the author was even kind. We have continued to consider organization from the least important to the most important; the nuts and bolts have had priority.

For example, schools in any educational organization should consider the individual first. The concept of individualism still provides validity for the development of various types of groups; once we look at individuals, and see how those individuals might benefit from group experiences, we can then develop an organization to provide for individual needs in group situations. Again, we should look at each individual child as a physician would a patient. What does this child need, what are his abilities, and what are his interests? On that basis, then, every individual student would have his or her own personalized program. From a practical position, and from a desirable point of view, at various times the student would be placed in groups for interaction with other students or to work with those who happened to have a similar common need at the same time. Out of the arrangement of individual and small group programs should grow an organization which would allow such a philosophy to function. The organization should be the last thing to be considered.

Until now, what have we done in most conventional schools? We have organized first; we have hired administrators, set up rigid schedules, announced dress and discipline policies, and determined group requirements. Prescription on a group basis has never been appropriate for every child entering that particular school. Even before we meet the individuals, because this organization calls for groups, we hire teachers; then we argue whether to group students homogeneously or heterogeneously, but in either case, we give one teacher 25-35 students; finally, when we have time, we think about individuals; usually these are the ones who cause some kind of discipline problem and are disrupting the organization. Once they are taken care of, we look at a few honor society students, even though societies should be eliminated. Usually we run out of time, so the needs of the students are never diagnosed as individuals.

State departments of education have been just as bad. They have their bosses; they have positions for finance, administration, regulations, requirements, certification; these have been the most important departments. Under them have come various sub-departments concerned with Indian affairs or audio-visual equipment, or early childhood, or curriculum. Those people responsible for actually improving learning in the classroom rank low on the totem pole. It is no wonder students are rebelling. It is no wonder we are hearing about students' rights. Many educators are beginning to strongly agree that if the present schools continue to exist, organized as they are, students should peacefully rebel, and rebel in a hurry.

The staff should meet the student first and then prescribe, in conjunction with the student or let him entirely select his own prescription--the kind of program best suited to the needs, interests, and abilities of that student. He should

be placed in a group only when being part of a group seems to have some value for each of the individuals. The school organization should be formalized only to the extent that it makes it possible for individuals to work independently, and for groups to organize easily. The process of determining the organization, placing students in groups, and never having time for individuals, must cease.

A school developed around a personalized philosophy needs a structure which provides for a pool of individual students. The question then becomes, "What are the needs of each student in this pool in the areas of the cognitive, affective, and psychomotor domains?" The individual is the first priority; daily smorgasbord scheduling or non-scheduling becomes a necessity if a school is to operate through the concept of individual students.

There are several methods by which to begin such a philosophy. One simple illustration presented here merely as an example of a practical plan, would indicate that on a flattened organizational line and staff chart, in order to pursue such an individualized concept, the school should have a director or consultant for on-going innovation--for future planning. In this arrangement this person is responsible to see that there are personalized programs for each individual, and that students' rights and desires are taken into account. Optional attendance and self-selection of courses force such an effort. The "leader" is assisted by a Design Team. This Design Team consists of learning consultants and students who act on proposals submitted from various members in the school, either students or teachers. In a large school, the consultant for on-going innovation and future planning is assisted by an associate or associates for learning resources, individuals who have as a prime responsibility the improvement of instruction in the classroom. The teacher--consultants, working with the future planning consultant, and the associates for learning, are loosely confederated into large learning teams. The teams interrelate the curricula; there are no individual departments and unrelated curricula; interdisciplinary efforts supersede departmentalization.

Experience seems to indicate that at present one way to begin an interrelated curricula is to organize the school around area centers: the math center, the art center, the music center, and other. This allows for development of a strong continuous program in each area. The way to start interrelating these centers is to identify experiences that students and teachers see that it makes sense to work together as a team. Examples of these are Theater Arts, where art, drama, music, and many others can work as a team; Business Systems where the former math and business areas work as a team; American Studies where English and social studies can combine; and such combinations as physics and industrial arts, and physical education and outdoor education. Combinations are almost limitless. It seems valuable, though, as a starting point in many schools, to house area centers in relationship to past conventional combinations. Thus art can be in physical nearness to industrial arts, music, and drama. Schools moving in these directions are finding success in interrelating curricular experiences for students and teachers. Other more advanced suggestions are offered in great detail in the curriculum chapter; the reason for these old examples is to stress that such concepts which have been around for years--the ideas of broader interrelated teams--really adds great potential to the schools.

Three of the major deficiencies in organizations of most state departments, school districts, and schools are lack of planning, lack of research, and lack of necessary leadership personnel. Practically none of the school districts provide money for long-range planning and development, or for research and evaluation. Yet the innovators are discovering that these are two key areas. There must be additional

leadership to accomplish research and planning, as well as persons responsible for achieving other change goals. Schools use a number of different titles which can be a tool for identifying these leadership personnel in schools, school districts, and state departments: Planning and Development, Learning and Curriculum, Research and Evaluation, External and Internal Affairs, Research and Development, Resources and Technology, Learning and Instruction, Structure and Planning, Learning and Counseling, Information and Reporting, and Team Coordinators are a few of the titles given leadership and/or Design Team members. Some are simpler such as Future Planning, Research Systems, Dissemination Programs, Human Relations, Student Services, Learning Resources, and Special Projects.

The important factor here is not the title they carry, or whether they are full or part time; the recognition is the fact that their functions are crucial; unless the educational organization has exciting, innovative, committed leadership giving direction to areas of change, the attempt generally will fail. These personnel can usually be provided for, at least on a part time basis, within the current budgets, by reallocating finances. The district, or school, or state which is going to successfully change, overstaffs in the leadership area during the first two years of change. On-going innovation demands constant committed leadership, but after the first huge push, functions can sometimes later be combined during a plateau period until the organization is ready for another tremendous push. In a truly innovative setting, this overstaff is going to be a fairly constant, yet flexible need.

If any school is going to significantly change, it must rely heavily on the impact of the leadership available. The innovative school leaders accept as a primary responsibility the achievement of successful change. There seems to be a high correlation between support of change by the principal of the school and innovative teaching. For example, the innovative principal surrounds himself with a supportive group of teacher exchange agents. They help determine the organizational plans. Others who do not get involved as much in decision making, but who are equally supportive, free-lance their influence by changing their classroom procedures and discussing them over coffee. In the better schools, faculty advisory teams are either becoming faculty decision making teams, or greatly influence the decisions made by the "Board of Directors." The good principals are turning over to others much of the running of the school. Teacher participation in organizational decisions is becoming one of the trademarks of an effective school. The Design Team and/or the Faculty Advisory Team, the Student Council and/or Student Advisory Team, the Director, and the Board of Directors, should all have designated decision making areas. Generally, the Principal or Director or Resident Consultant should hold veto power over most policy decisions, but these should be subject to override and appeal.

The management of the school (management is probably a better term than administration, as the former involves risk taking and the latter relates to nuts and bolts), the "consultants for innovation" in the "going" schools, make very few decisions. They lead in the selection of personnel, in the allocation of resources, and in asking hard questions. But most of the decisions are made by the teachers or by assistants hired and trained for that position. Certainly arranging for buses is important; buses, unfortunately, still affect curriculum development and school activities, and ultimately school morale. But the innovation leader should not take time to arrange for buses. Some of these types of supportive decisions need professional judgment, but many can be handled by para-professionals. The good principal, or director, or dean operates as a resident consultant; in fact, some are now adopting that title.

There are a number of national recommendations for reorganization of the administration. The NASS model calls for the principal to spend 75 per cent of his time as the instructional leader; the assistant principal leaves the old role of disciplinarian and becomes an instructional leader too, with his next step to that of principal. Depending upon the size of the school, additional directors or coordinators are hired to handle the student activities, discipline, budget, and other such areas.

But another school of thought is emerging which generally indicates that the principal must be the manager of the Environmental Climate. In this role he is not expected to spend 75 per cent of his time in instruction, but must be involved in all aspects, because he must see that the environmental climate for change and innovation is developed and maintained in all areas. Devoting 75 per cent to instruction would mean that some parts could become static for lack of overall leadership.

Either concept could pursue the resident consultant notion--one seeing him as primarily in instruction, while the other as a manipulator of the total climate. In theory and in the desire of most "change agents," the instructional leader plan sounds most desirable. However, in practice, most change agent school administrators have been the environmental specialists. They have had to have their hands in every pie in the school in order to see that the innovative mix was created and maintained, but associates carry out the details as part of decentralized authority.

The environmental concept, again depending upon the size of the school, could possibly see an organizational arrangement as follows--as again only one example of many. The Resident Consultant would be the total environmental manipulator, would serve as Director of the Planning Center, and would be involved in all concerns more equally--not 75 per cent in one area. He would be assisted by Directors of the following key "Leadership Centers" needed in an innovative school: Research, Media, Programs, Learning, Administration, Person, and Dissemination. In a complicated, or highly innovative, or very large program, in addition, the Resident Consultant needs an administrative assistant to handle much of the detail. The Consultant spends so much time in conversation that the day-by-day desk items need attention from a lower salaried individual.

At first this appears to be a gigantic bureaucratic component. However, innovative schools should be heavily involved in research; they need a highly trained librarian-media specialist who would have assistants; they need someone to handle student activities, enrollment, food service, parent communication, and other such program jobs. The learning director is the one who spends 75 per cent or more in instruction, teacher education, and learning experiences. The administrator takes care of the budget, facilities, scheduling, ordering, and all other such needs, while the disseminator is needed to handle the thousands of requests for information, visits, pamphlets, and other outside input. The Environmental Specialist, as planning director, then has the responsibility to see that all these areas blend into a truly humane, creative climate. These eight, plus assistants, form a Support Team for the other instructional teams. Four or five of the eight or more--planning, program, learning, and administration--can serve as a decision making Board of Directors to expedite the change process.

There are strong arguments for both of these approaches and for others, but to accomplish either of these organizational philosophies obviously means that schools must be staffed differently. No longer can a school operate with one principal, one

assistant principal, and 50 teachers. Some of the teachers must be "prescriptive, doctor/teachers." In other words, some teachers on the staff must have seven to eight years of training, must be employed on a 12-month basis, and must be able to diagnose and prescribe the educational needs of boys and girls. They are the fine teachers who can spend 24 hours a day on school problems.

A second category of teacher-consultants should be "nurses." They work nine months a year and usually an 8-4 day. They might be excellent teachers, but ones with families and not enough time to devote full energy to school. They might be poorer teachers who need to work with more qualified persons, or they might be potentially good, but young and inexperienced teachers just out of college.

In addition to the "doctor" and "nurse" type teachers, there is a need for "nurse's aides." These teacher aide para-professionals may serve instructional, clerical, supervisory, or special roles. Fourth, there is a need for trained specialists and technicians on the differentiated staff. Hospitals have blood, X-ray, and other laboratories, under the direction of an M.D., but with assistants. Schools need help in the areas of psychological, sociological, and physiological evaluation. Finally, schools need "candy-stripers"--parents or other types of volunteers from the community or older students in the school.

The present principal-assistant principal-teacher method of organization may be satisfactory for the conventional school; it may enable the status quo to function. But it is not the kind of staff needed to achieve change, nor to provide for on-going innovation; differentiated staffing is one of the possible answers to new leadership arrangements in schools.

The Design Team or Board of Directors, or Support Team--the leadership group or groups and subgroups discussed earlier--coordinate the efforts of a school with a differentiated staff. This team or these teams, besides having people qualified in the role assigned, such as research, or resources, or curriculum, must also be planned to provide for a true TEAM FOR INNOVATION. There is definitely need for different types of personalities, and different roles for those personalities. There must be individuals who want "power" and methods in change--the more dictatorial or "do it" approach; there must be individuals who prefer the re-educative approach--the let's sit down together and work out a plan that can allow the group to reach a consensus. Some on the team must prefer the "rationale" approach to changing people--doesn't it seem that if we could do it this way, we could have a better school?

The impact of change and innovation at the classroom level has been disappointing; in most of the so-called innovative schools, there seems to be little difference in what is happening when the teacher and the learner get together. One of the real criterion for change is to investigate carefully what happens to Johnny in his relationship with Mrs. Jones and with the learning which occurs, regardless of the method of scheduling which got him there.

As has been indicated the dynamic leader in the exciting schools today surrounds himself with some type of Support Team. Besides their component roles, and their methodology, the team needs personalities who operate with describeable, though not always conscious or planned techniques. For example, the team might consist of the following kinds of people.

One type of person who is usually desirable is a needler; he or she is constantly fussing about the need for improvement in what the school is accomplishing; a second person should be a dreamer, one who is constantly thinking about ways the school could be made better, assuming the needler is right; a third person should be the developer, who sees his responsibility as that of implementing some of the changes the needler and dreamer have planned; a fourth should be a searcher, who attempts to analyze and evaluate whether the teacher-learner situation is any different; a fifth is a perceiver, a psychologist who knows learning theory and who also can help solve personality disputes when blocks develop between individuals over the issues of change and potential improvement; and finally a stabilizer, a handholder, is needed--a person who can hold the organization together and who is trusted by the more conservative element in the group to make sure that the organization will not go too far off in left field before the evaluator has a chance to determine some of the impact of the change on the classroom.

Examples of the team use of the power, the re-educative, and the rational kinds of approaches to students and teachers in the organization can be illustrated: the needler may speak more from the dictatorial point of view--that this is what we are going to do because we must. The dreamer may operate more from the rationale point of view--in other words, he may say it appears to me that if we could just do this, it would certainly seem that we could improve what we are doing. The implementer may operate from re-educative techniques. He may sit down and discuss individually and in small groups why these changes might be desirable, and how they could benefit the students.

In addition to the management Support Team, most all the teacher-consultants in the school should be organized into teams. But the teams should be different than those we now have in most teaming schools. Instead of consisting of six self-contained generalists, the team should consist of people with special talents. Some of the team members should be potential actors; they are the ones who usually are excellent at large group presentations, at appearing before the students, and at preparing motivational materials to arouse the interests of the students. Others on the team may be primarily writers, people who are excellent contributors to education, but rather than lecturing to students, might contribute most of their time to writing materials for the teachers to use. A third type of consultant on teams should be the organizers, those who can sit down and figure out how they can move a student from here to here, or that group from there to there, with a minimum amount of confusion and maximum efficiency. A fourth type of consultant on the team ought to excel as discussion leaders. Some teachers are very poor at large group but are excellent with small groups of children. Then we need helpers on the teams; these are teacher aides--para-professionals of various kinds--who assist the teachers; finally, we need the creators--those who have new ideas, who can sit down and say, "Maybe we could do it this way." All should be fairly effective in one-to-one conferences with students.

In most present school organizations, we look for teachers who are generalists, who handle discipline, and who know their content. But in the very near future, probably three-fourths of the population will be working on products not yet invented. What methods are really of value, what is it that learning teams should organize to learn? What kind of support do learning teams demand? As one example of the need to reorganize teams, look at the area of graphic arts; how many schools have one or more visual artists employed on the staff--only a few throughout the United States. If a school does not hire a professional visual artist, it certainly should have a housewife type visual technician--a person who works at para-professional wages for six to seven hours a day, who has amateur artist talents,

and who can cooperate well with teachers. This person is available to make transparencies for use on the overhead projectors, filmstrips, slides, and other such devices. With this type of support, either on the team itself, or available to the team, depending upon the size of the school and the team, improvement of large group presentations, open studio--and independent study occurs almost immediately. But very few schools have this type of talent available to teachers, and because many teachers lack talent in the area of visual arts, unless there is someone to make the visuals, or unless they can be purchased they just aren't used.

In the discussion of differentiated staffing, the need for staff associates was mentioned. We need learning and problem specialists available for immediate diagnostic assistance. This is especially true at the traditional pre-kindergarten through third year levels. If a child finishes "grade 3" with serious deficiencies, he is usually lost as far as his future in the traditional school work; he is the remedial reader, in the slow group, and often a discipline problem and pushout at the high school level. Schools and school districts, or a confederation of school districts, depending upon size, should have full time people concerned with learning, curricula, emotions, perceptual-motor problems, home environments, and physical conditions. Most schools have no access to immediate help from psychologists, sociologists, and physicians. If they must rely on overcrowded mental health clinics, the child is sometimes able to have an appointment in three to six months for diagnosis only. Very little time for treatment is available, and costs of private consultations become prohibitive the way we are organized now. If school districts have part or full time psychologists and sociologists, they are usually few in number, and their load usually makes instant feedback to teachers impossible. Availability of physicians, in most cases, is through the family, and sometimes not possible at all if financial or cooperative environments are not present. School budgets must be re-allocated to provide immediate diagnostic assistance to teachers. The open type schools are hopefully reducing the need for these services as they start new programs for young folks, but at the moment there is tremendous need for the availability of such resources.

This immediate need for diagnostic assistance is easily tied to the plea for a Support Team, and for special field leadership. The instructional leader for curricula and learning must be freed for just that. He must be aided by leadership in research, resources, and learning content and methodology. There must be organizational leaders to see that the entire structure fits together. The traditional patterns of school staffing, organization, and leadership all need drastic revision.

As just a brief example of what can be done to implement changes in teacher assignments with the same budget and staff, here are three of six or seven possible different types of elementary school team organizations, considering at this time only their primary content area assignment. These are not "way out" 1980 designs, but easy to accomplish 1960 patterns, included here to illustrate the simplicity of making rapid organizational changes.

One arrangement could be called the specialists team; in this plan, each teacher is responsible for only one subject field, but usually will teach it on more than one "grade" level; this is not departmentalization, but is teaming as long as the teachers of the various subjects meet often to talk first about boys and girls, second about the learning experiences needed by these boys and girls, and finally, the organization which will best provide the needed experience and environments. As each teacher knows each student, it is quite easy and quite effective for the teachers to plan a personalized and individualized approach to education; each

professional is able to contribute personal insight as to the developmental needs of the student, and thus provides opportunities for group diagnosis and prescription. Teachers working in this system get to know large numbers of students better than they ever knew their own small group of students.

An offshoot of this specialist arrangement is the semi-specialist team. This is effective in small schools where complete specialization may not be possible or desirable. In this arrangement, each teacher might work in the areas of language and math, then specialize in a third area such as science, social studies, or art.

A further arrangement is the non-specialization team. Here each teacher assumes leadership or "head" teacher responsibilities in one subject area, but then teaches in all the areas. Though at first this plan seems desirable, on closer examination, it means that all teachers must continue to teach twelve separate areas. Industrial arts, physical education, home economics, science, art, and music are finally being accepted in the elementary school as on a par with all the former magic areas. Most of these subjects cannot be taught effectively by presently trained classroom teachers; further we are finally admitting not everyone in the elementary school is a good reading teacher. By allowing elementary students to select their own study areas and teachers, schools are immediately forced into a new type of structure.

As we explore elementary school organizations, it becomes quite apparent that there are seven or eight arrangements which are as good as, and in most cases better, than the old self-contained rooms. It is essential that we continue to search for better learning environments than the 120 year old Quincy Box.

As the faculty studies new approaches to learning, certainly the guidance and counseling programs are going to be forced to change. We can no longer tolerate guidance counselors who are really no more than glorified clerks, whose main jobs are to see that students have enough credits to graduate, to help make college applications, and to figure G.P.A.'s and class rank, or assist with discipline. Instead of counseling offices, we need a Person Center, where individuals are more important than regulations; we need facilities with large open room areas furnished with carpeting, soft furniture, and soft music; here the adults work in an open environment, and are available to interact with students when the students feel a need to talk to an adult who serves in the role of a counselor. Further, Person Center individuals should be part of the teaching teams. We want them to sit in on team planning and discuss the problems that teachers are having with individual students. We want them to work as part of an instructional team so they will occasionally present large group, small group, and independent study materials related to counseling and guidance. We want them to work in the student center where they can talk informally with students over a doughnut and a cup of coffee. We want them to be known by students as human beings, and not as somebody seen only when there is a problem. We want the counselors involved as diagnosticians and prescribers. We want them to suggest those who need more structure, and help to develop a structured program for the students needing such a plan. Teachers should serve as advisors, selected personally by each student. The school "counselors" should be ombudsmen--wandering the halls visiting with students and advisors. The day of the counselor in an office is gone. The emphasis is on the person and human relations.

Right now it is almost impossible for the majority of students in a traditional school to see the counselor. Elementary schools seldom have them. In high schools, the student must go to the secretary first, because the counselor is locked in a

cubby hole behind a closed door. Usually the student has to make an appointment with the secretary and wait for a considerable period of time before he or she can get to the counselor; then when a conference is arranged, it is behind a closed door where the counselor sits behind a desk, as a voice of authority, rather than in an atmosphere which lends itself to a friendly open kind of discussion. What we should do in most schools is tear down all the walls around the present counselor cubby holes and develop an open environment conducive to interaction between students and adults. Private conference areas are still available off the open Person Center if really needed. This certainly involves the counselors in a more human relations approach toward the curriculum than that now existing in most schools, where counselors are concerned about requirements of the school as their first effort, and then toward trying to fit students into slots in group-paced courses, depending upon whether they are smart enough to be in track one, or whether unfortunately, they are problem learners and therefore are in slot three, and must be dumped into art and industrial kinds of courses, as if they were not academic.

Some states do not think art, music, home economics, business, and industrial arts are important. They do not require them for a diploma and give only limited credit for some of the courses offered in those areas. This is typical of the kinds of archaic thinking which goes on in many levels of the state departments and generally by most educational administrators. Courses should not be required in high school, but if they are, why are English, social studies, math, science, and physical education important and the others not? Secondary educators are still guilty of perpetuating grievous sins caused by the almost unbelievably obsolete college admission practices and the national testing services. Heavy reliance on ACT and SAT scores have caused the school program to follow a pattern suited to practically no one, especially to non-college students who are nevertheless dumped into required social studies.

Look at the American College Testing program. They measure only English, social studies, mathematics, and the natural sciences. Why not art, or child growth and development, or industrial education? One of their 1969 sample questions asks: "When Western Europe was cut off from some of its Middle Eastern oil by the Suez crisis in 1956, most of the petroleum deficit was made up by the United States and F. Canada, G. Eastern Europe, H. Indonesia, J. Venezuela." The plain blunt response should be, "Who the heck cares? Punch a computer button or look in a book." Why should students of all walks of interests and abilities stuff such irrelevant nonsense into their memory banks? Greater reliance must be based on school decisions made through individual concern for each student as determined cooperatively by the student, the teacher, and the advisor.

This process of having each student select his own teacher-advisor-counselor-adult as an initial contact person, and then having these teacher-counselors interact with the trained guidance specialists, sociologists, and psychologists has proven to be of tremendous value; each advisor can have 12-15 students to communicate with in a warm adult-student relationship in a friendly setting.

Related to counseling, schools must consider the use of some types of sensitivity training for both students and faculty. If we are going to work as teams, and if we are going to work at personalizing education, some teachers and students may benefit from a type of group interaction. It is sometimes difficult but we must reach a point of internal comfort if we are to work with others in small groups. Team relationships, self-discipline, and seeing one's own image in group situations become important as the new school organizations are developed; however, there are

many different ways for individuals and groups on a staff to be involved in learning about themselves and others; the current common sensitivity groupings are not necessarily the best way.

In organizing to make some of the changes suggested thus far, schools must set priorities. The first priority is to develop, as we have said before, dissatisfactions and commitments which say these changes are necessary. Then the staff must determine what are the immediate revisions which must be made in their particular school. For example, some may feel at the present time that their three greatest needs are to develop new resource centers, to eliminate group-paced instruction, and to start a number of brush fire projects--pilot type attempts where kindlings throughout the district may hopefully reach a bonfire stage in the near future.

In most of the school districts we have had a philosophy of we would like to, we know we should improve the schools . . . but Then we go ahead and list all the reasons why we can't. No money, colleges won't train teachers, lack of in-service preparation, no time, state department won't let us, the board won't buy the idea, and, and, and. What we must do now, is to try a philosophy which says, we MUST make these changes; therefore, what are the priorities, and what are the steps that we can immediately take to implement the priorities and thus improve the schools. Superintendents already claim that they are doing this, but most really are not. They are only working to improve the status quo--to add a classroom or a music room, to buy new textbooks, to build a new high school, to hire better teachers, or to revise the 10th grade English program. Though these efforts are usually useful and needed, they do not go far enough; they are not real change; they only improve the old model; the forward looking schools in America are not just refining the old--they are developing new ones.

How many agree that the types of organizational changes suggested in this book--changes in staff, in leadership, in curriculum decision making, and all the others proposed in other chapters, are really important? How many agree that they are essential? How many are even willing to consider the possibility of some of these notions being implemented in their schools? What chance, nationally, do we have to win the battle to revise the public educational system?

As had been indicated in earlier chapters, at the present time about 30 per cent of the educators, parents, students, and interested laymen are in the involved stage. They are the ones who are now either deeply committed to change or who are at least supportive, even if just involved in fringe effort. Some may be latecomers to innovation, but at least they are trying a minor kind of pilot study. Even though probably only 10 per cent of the population are deeply committed or deeply involved in change, there are about 30 per cent of the population who can see a need for a new kind of school; they are willing to actively develop new programs if the nucleus will lead.

There are about 40 per cent who are still sitting on the fence watching. They are not necessarily against change, but they are not for it either. They are sitting back to wait until it can be proven, one way or another, which way is the right direction.

About 30 per cent of the people in the country today, educators and laymen alike are resisting change. They are convinced that what we are doing in schools in terms of new organizational patterns and all the other revisions that are taking place are absolutely wrong, and they are doing what they can to prevent these new ideas from being developed.

Is this 30-40-30 position a bleak outlook? No, because five to ten years ago probably only ten per cent were involved at all in any shape or form. About twenty-five per cent were on the fence watching; they were willing to take a look at what might be happening to schools. Another sixty-five per cent were resisting. As little as five years ago, those willing to consider change were still a minority. At least we are now in a position where a majority are willing to talk about and listen to presentations about new ideas in education.

Unfortunately, two negative items still exist. One is that most so-called innovative schools are still really in the talking stage, or have only made surface attempts at change. Another problem is that school districts and schools think they must have a majority to change. This is not true. Start with the 30 per cent who are ready, and let the fence-sitters be won over slowly by example and observation.

What about the future? In another five or ten years probably about 70 per cent of the educators and lay people will be involved in some kind of educational change. They will at least be trying a few things. The 30 per cent now involved in extensive change will truly have individualized, open concept, continuous progress, self-paced kinds of programs. They will be at the forefront of the schools we are trying to create now. The 40 per cent fence-sitters will have moved into innovation circles by then; they will still be at the fumbling stage, the one so many are groping with now. About 15 per cent will continue to sit on the fence watching, and another 15 per cent will still be resisting; but there will be a definite acceptance throughout the country toward involvement with the ideas and people which may produce the schools of the future.

More and more we are realizing that in the first years of change, the "dictatorial" method works better than the group involvement one. How can the teacher vote whether to adopt a change if she has never experienced a situation where the proposed revision has been practiced. Many of the innovative schools never really get the amount of change going that they could because they seek group consensus involving persons who know nothing about the topic, other than what they have read, heard, or visited. It is usually best to "plunge" into the change and work hard to eliminate the bugs week by week, rather than to "academically" study it and vote it down or wait three to five years. Group involvement and decision making is better after the teachers and students have experienced the change; thus they eventually control its development, but the initial decision to adopt the revision is made in a dictatorial manner by the director of innovations, after consultation with the supportive leadership groups--particularly the key students and staff.

A major factor in organization for selecting and implementing innovative changes, and one that too many schools overlook, is that teachers need time to dream. This has always been a deficiency in schools; teachers have not had an opportunity to dream. They are with the students all day long. As indicated, with flexible scheduling and team teaching, 25 per cent of the staff can be released at any one time. This gives the teachers time to take Thursdays off to dream, to prepare materials, and to make decisions. This is another reason why a new organization in the schools is so essential; we need a structure which will allow accomplishment of things never before possible in the educational system. Teachers at many innovative schools are urged, forced, convinced to take several days away from school to think, plan, rest, work, and change the pace. Besides scheduling and teaming, the use of para-professionals has been a boom to the concept of dreaming, as well as providing a better adult-student ratio, one of the basics in a humane school.

However, the increasing use of para-professional personnel in the public schools makes necessary the formation of guidelines and policies that can be used by administrators and boards of education. State departments of public instruction in cooperation with teacher and administrator organizations must formulate guidelines to shape future direction for school staffing. The pioneers in teacher aide projects have developed suggestions which districts can follow when planning for para-professionals. There should be no need to impose rigid state certification laws if districts adhere to the spirit and intent of para-professional employment.

The primary concern of the various groups of educators, as policies are established, is to be certain that the activities of para-professional personnel are under the direct supervision of professional teachers. When certified teachers assign the tasks, there is no question as to whether the aide is usurping the job of a professional. The aide does those things she is competent to perform, as determined by the teacher staff.

School districts which have experienced difficulty with the use of auxiliary personnel have often failed to insure a continuous effort by teachers to cooperatively plan the activities of aides. The teachers and the aides must arrange time during the school day for face-to-face contact so that details about the program for children can be intelligently and carefully outlined.

In team teaching situations, the aide must become an active participant in many of the planning sessions so that assigned tasks for the aide grow out of a discussion of priorities necessary for the improved utilization of the professional teacher's time. The basic distinguishing feature between professionals and para-professionals is that the certified teachers are the ones who should have the clinical training, and thus the responsibility for individual diagnosis and prescription for the children. The aide should be viewed as an additional resource to better accomplish the instructional task or learning experience.

State departments must be careful that established policies regarding the use of para-professional personnel do not bog down in a series of regulations that establish certification based on college credits or other criteria that cannot be met in rural areas. A requirement that an aide have a certain arbitrary number of college credits does not insure that a given individual will perform well. A personal interview by the administrators and teachers planning to work with the aide would be more important. The individual should be hired on the basis of need--to strengthen the abilities of the teaching staff. Some community colleges have now embarked upon a program for training para-professionals; colleges, both two and four year, are considering the granting of Associate Arts degrees in education.

There is no intention in the employment of para-professionals to put teachers out of a job. With the need for quality teachers (the quantity currently has little bearing on the quality of many beginning and tenured teachers) and for those highly trained in special areas, schools are faced with the necessity of arranging staffing patterns similar to those of a hospital. Some teachers will become doctors and some nurses, and para-professionals will play the role of nurses' aides. Further, experimental teams of five teachers and six aides for 175 students have given indications of being a better staffing pattern than seven teachers and no aides. With an adult ratio of a maximum of 1-10 needed in the primary program, aides become essential in most budget allocations.

Never should the employment of aides reduce the amount of money spent for the instructional staff. If a district has been hiring on a basis of 1-25 at a cost of

X dollars, and then that district decides to employ on a 1-40 professional ratio in order to hire aides, the same amount of money should be spent for instructional salaries as if the district were still hiring on a 1-25 basis. This type of standard would actually increase the adult-student ratio in many schools for the same expenditure of money, since approximately three aides can be hired for the salary of one professional teacher. A realistic regulation prohibiting a district from reducing its instructional budget as a result of the utilization of aides, and an understanding that aides be used to supplement professional teachers, could well avert potential abuse by school districts who are financially disadvantaged and insure a continuation of quality education for the students.

While it is most desirable that state departments refrain from rigid certification regulations, suggested utilization criteria should be established. Pay scales usually are differentiated according to background and experience; for example, instructional aides may receive higher salaries than supervisory aides. All aides must understand that often part of their duties will be helping with "little" things such as tying shoes, cleaning paint brushes, and stapling worksheets. A description of para-professionals using the following categories seems workable as part of the guidelines for hiring:

Instructional Aide--This person preferably should have some college or special training, though not mandatory. Districts could well set up their own qualifications in this area; larger districts where a supply of college trained people exists could establish higher requirements; a guideline of two years of college or university training might be minimum for the instructional aide in many communities, though the individual is more important to consider than number of college credits.

The instructional aide can be a person who works with small groups of children needing additional or special help with a given skill. A well trained aide in subjects such as music, art, or foreign language could be used to supplement areas where the professional staff is deficient. If a school finds an excellent candidate, but one who has no college, that person should be hired; the quality of the person is the key, not the college courses; other things being equal, some college is preferable, but may be impossible in rural areas. Ability to work with kids and knowledge of the subject are much more important.

Clerical Aide--This type of para-professional need only have the skills necessary to type, record, and maintain all types of school records. Persons with business and secretarial training or experience are usually available. They should type and mimeograph for teachers and can correct objective evaluations.

Supervisory Aide--A love for children and ability to communicate this love is of utmost importance. A supervisory aide under the direction of the professional teacher can supervise playgrounds, cafeterias, resource centers, rest periods, and study areas, thereby freeing the teacher for instructional tasks. A housewife with no particular training other than experience in handling children can be used to fill this role. She can function as part of the teacher-to-talk-to program, whereby each child can select an adult to know well. The supervisory aide usually has the responsibility of more of the "little" items mentioned above.

Special Aide--Automation and technology will demand the use of help in the operation of all types of audio visual equipment if the teacher is to effectively utilize time for instruction and individualized work with students. Research which shows that retention increases with the use of devices enabling the student to see as well

as to hear continues to emphasize the importance of a multi-media approach to instruction. Preparation of visual materials for the teacher to use is a necessary facet of a sound media program. Persons with an interest in mechanical devices, and those with an ability in art would be of tremendous value as special aides.

Of course, combinations of the four types of aides can be secured, depending upon need and size of the district. In any case, if aides are hired by local school boards on the basis of empirical evidence of competence based on the needs of the educational program, rather than on the basis of arbitrarily imposed requirements, a dynamic program of staff utilization can be built by the cooperative efforts of administrators, teachers, and aides.

In determining how to make decisions as to the kind of organization to develop, regardless of what the related topic may be (staffing or other), some type of decision making process is essential in each school. This should be spelled out with, by, and for the staff and students. Some of the ingredients which might be considered for inclusion in a decision process may seemingly be contradictory statements, but an eclectic system usually works best.

Generally, the organization of a school should follow a democratic decentralized approach. Those affected by the decision should be involved in developing that decision. The line and staff idea ought to be flattened as much as possible; decisions should be made as close to the level of the decision as practical. However, in the first years of change, a somewhat dictatorial democracy must exist; further, as long as ongoing change is to be the policy, some "dictatorial" decisions will always be necessary. Hopefully, the majority of decisions should be reached through a program of information. First, we need to explain the process as to how we plan to make decisions, then explain various states of transition, and finally, explain why a type of dictatorial approach is necessary in certain stages of change.

Many decisions are made by the student himself or by the student in consultation with a teacher. Additional decisions are made by teachers or by teaching teams. When a decision affects a broader number, the decision can be recommended by the Student Advisory Council, the Faculty Advisory Council, or the Parent Advisory Council. These three councils can recommend directly to the administration; however, if the topic affects all three groups, the recommendation should first be approached through the Joint Advisory Council. The proposals can then come to a Board of Directors, perhaps composed of several non-teaching personnel, who recommend the final decision. The advisory councils have less need to function where trust is placed in the Board of Directors; this is a highly desirable relationship and saves hours of time.

The decentralization philosophy involves final administrative decisions made by the Board of Directors; in addition, the planning director, the program director, the person director, the administrative director, and the research director can make final decisions in their areas of responsibility, though usually they do so after consultation with other staff.

In the total structure of the hierarchy, the principal still technically makes the final decision and can override recommendations. However, hopefully almost all the decisions reached are from a consensus of the various advisory councils (Student, Faculty, Parent, Joint, Administrative) and, therefore, are actually made by the group involved, and not by the director. Only in rare cases will

there be a veto; if the involved individuals or groups cannot reach a consensus, then the principal, consulting with the Board of Directors, can make the final decision.

In the transition stage, all of the above mechanisms operate, but not all groups of individuals are as yet as heavily involved in the decision process as they could, should or eventually might be for two reasons: (a) they are still learning how to make decisions and to accept responsibility for those decisions, (b) the director purposely holds on to some "power" for the time being, to make decisions to help speed the school over the troubled spots while attempting rapid change. In history we have examples of where the benevolent dictator concept has been the best method for a given country at a given moment in time. This does not mean the director should see himself as a benevolent dictator, but there are times when speedy, decisive, individual action prevents further difficulty and/or solves the immediate pending crisis. Then, too, there are times when an individual as well as the group must accept the responsibility of a decision.

There is a need for a "dictatorship" in the early months of innovation, and change in current educational institutions. It has been found in educational studies that much of the 50-year time lag in adopting change has been due to the inability to convince the majority to try a new idea. Yet in almost every case the vote was taken out of ignorance. Example: do you want to operate this year without bells? The vote the first year is usually 80 per cent "no," 20 per cent "yes." But how does the staff make an intelligent decision without any experience with that realm? After a year of experience with the program, the vote is usually 80 per cent "yes," 20 per cent "no," assuming that the proposal was originally a good one. Thus the director often needs to operate as a "dictator" the first year--"we will turn off the bells, we will not give ABC grades, we will have optional attendance, we will individualize instruction."

The staff is asked to try these concepts; if they do not work, or need modification, the staff is then consulted. Gradually, as an experience bank is established, more and more of the decisions become those of the faculty. The director makes most decisions at first; then the administration is decentralized. Soon new policies and modifications are recommended by the faculty; they begin in advisory groups to formulate policy, programs, and decisions in all phases of the school. The eventual plan should lead to the director ultimately becoming a "resident consultant," with most all of the decisions in the hands of individual associate directors, faculty, teams, student groups, and cross combinations of these various individuals and groups. However, if the school is to remain a viable on-going change school, elements of the "dictatorship" will always be found in any forward looking, innovative school. Change cannot stop after two or three years of a big push; it can temporarily slow down after a "catchup" period, but must be continuous.

Rapid, dramatic change needs a dictatorial approach in the early stages, but to ensure on-going innovations, the decision making authority ultimately must be involved with democratic procedures. The decision making process becomes a key facet in the ultimate acceptance of change.

But unfortunately the whole matter of decision making and the organization of schools --whether we are talking reorganization and combining of several districts, or organization of only one district, or organization of a school, or organization of the curriculum within that school--will not be successful in any community or state unless four elements begin to work together better than they have in the past. As one of the four elements, the universities must become more involved with innovation.

They must help to prepare future teachers and administrators for the kinds of schools which we need now, and for the coming 70's and 80's. The universities have been a bed of conservatism. They are the best example of poor teaching. It is time the universities become powder kegs for change.

The state departments are a second element that must change. They must assume leadership and a philosophy that says we must encourage schools to innovate and develop exemplary programs to help boys and girls. The focus of the state departments must be on the classroom, not on certification, finance, and administrative trivia.

The public schools, who obviously must join in a partnership with the universities and state departments, are the third element in the picture. The schools cannot change without help from the universities and state departments. By the same token, the universities and state departments cannot change unless the schools are in tune with what professors and state departments are advocating as necessary improvements.

The fourth element is the political arena, the legislators and the school boards. No matter what we as educators may desire to do, unless the school boards and the legislators can see the desirability of the change, and give the support we need, change will not occur in the given state. Most states have not had the support of the legislators and school boards in terms of organizing for change in education. It is time that we develop new approaches toward working with the political leaders in the communities.

Schools must organize for change. This chapter is not theoretical; we must make practical application of new methods. But no matter what area of change is of concern at a particular moment, there must be a planned organization in the school to carry out the proposed adoption. As we work in individual school situations, we must remember that unless the universities, the state departments, the schools, and the school boards and legislatures work closely together, all the theory of organizing for change probably will be of little value; but with cooperative spirit, new organizations in the schools can truly achieve exemplary programs for the boys and girls in the classrooms now and in the future.

Developing Meaningful Curricula

The most meaningful curricula usually is that which is developed by the student. It generally reflects those areas of interest and/or need at a given moment in time and is more nearly in line with student abilities, or perception of abilities than those prescribed by an instructor.

Students should be able to take most any course they can dream up if three criteria are met: (1) the student is sincerely motivated to learn the material; (2) there are materials, equipment, trips, or other resources available; and (3) there is a staff member and/or an adult in the community to act as a guide, consultant, and evaluator.

As was pointed out in the chapter on individualizing curricula, level four, or the basically student determined program of objectives and media, is part of the long range goal of curricular experiences for youth. However, some students presently are not at that level and need guidance in selecting and beginning learning opportunities. Further, for these latter individuals there should be a pharmacy of known resources immediately available for them at the time the interest or at the time motivation develops.

There are many excellent materials now appearing on the market. Individualized print and non-print materials are becoming increasingly available for the consumer in greater options than ever before. There is no reason for teachers or students to spend hours writing and searching for information on programs already developed. Most of the new materials of the 60's were still all group-paced, but fortunately as we have moved toward and into the 70's, more and more companies began to produce and are now publishing items for individualized learning. The majority of the objectives and media in these programs are still writer and publisher developed, but most can be modified for personalized student use or for small groups with specific purposes; they do provide a starting point for many students and teachers.

The more a school chooses to look at curricula as an individual rather than a group matter, and the more students are involved in selecting and/or developing learning opportunities, the more a school must arrange for individually paced materials. It will be several years before commercial companies begin to provide for the majority of the needs of a self-selecting school; they may never be able to completely keep up, as it takes them too long to produce materials; further they cannot yet anticipate all the interests which develop within individuals at different age levels and abilities, or all the new discoveries which are continually being announced. But schools cannot wait for 1975 for the publishing companies to offer more help; thus staffs must create methods of developing immediate curricula with and for students.

In the future, instant retrieval systems and all other kinds of automated technological developments will ease the resource lag. For the moment students and teachers have had to learn to write their own programs. They have been time consuming and not always of the best quality, but the method has provided a stop gap vehicle.

In the conventional schools of the past and present, many children have reacted or do react passively to learning because teachers are so concerned about content that

they often forget to develop innovative attitudes in students. Rather than memorizing content, the learner should become an explorer. If some of the best learning occurs when teaching, then the current efforts to write materials have been and still are worthwhile efforts where it fits a specific purpose.

Innovative teachers and school districts during the 60's attempted to use contracts, capsules, minipacs, learning activities packages, unipacs, and a dozen other similar plans. The UNIPAC, "a self-contained kit designed to teach a concept, structured for the individual, for independent use in a continuous progress school program" is a good example of the effort. This plan essentially entailed the inclusion of a major idea and component ideas, learning objectives clearly stated in behavioral terms, a pretest, diagnosis and prescription, alternatives, diversified methodology and content, basic-depth-and-quest units, student self-evaluation methods, and post-tests. It has advantages in that it can be written by the student, by the teacher, or by a combination of several students and teachers. The Individually Prescribed Instruction program is another example of the types of materials being developed by projects--the cycle including field testing and sale to a commercial company before being easily available to teachers from publishing houses.

None of these kinds of efforts have been the answer. IPI has been too structured; some of the UNIPACS were too unstructured. All the teacher and student made packets and capsules run the risk of lack of quality--though some are excellent. No one curricula approach should be used across the board, especially in group required courses. But where any of the efforts fit a particular student, a particular teacher or team and a particular subject approach, they have been extremely useful in aiding schools to individualize and self-pace. They are still of value today and hopefully are providing exploratory models which will eventually lead to a whole new curricula concept in the 70's. They have been and are forcing a new look at learning philosophies and psychologies, and are aiding developments in the areas of logical thinking, discovery, inquiry, intelligence, and early childhood education --all much needed improvements in education.

While teachers and students are writing homemade materials, a look must be taken at all the curricular projects which were developed in the 60's and which are now being refined or extended into the 70's. Each year additional new materials are being marketed. For example, the past ten years have seen the development of ITA reading and language programs, BSCS Biology, AAAS Science, Harvard Physics, PSSC Physics, movement education, Random House readers, SRA learning kits, Nebraska English, IPI, Illinois math, Greater Cleveland curricular projects, SMSG math, Georgia Anthropology Project, ALM foreign language programs, environmental and sex education curricula, Psychotechnics, American Industry Project, "guaranteed performance" companies, IMS math, humanities studies, minority studies, urban studies, and, and, and. We could list several hundred "new" curricular programs over the past ten years, either developed by universities, federal grants, commercial companies, or small groups of individuals. Social studies alone has over fifty such efforts. No attempt here is made to list all of them or to recommend any of them.

The point is that there has been a tremendous impact on the curricula through the introduction of teacher written packets, national projects, and commercial companies. Unfortunately many districts have ignored much of this movement except in math and basal reader programs. But the better districts have plunged into the investigation of curricula with a refreshing zest. During the 70's there probably will be a fantastic deluge of new materials and curricular ideas on the market. The Westinghouse Learning Corporation has just published a \$90.00 Learning Directory

to help educators assemble all the present choices. This type of resource plus the ERIC summaries will provide further stimulus to curricular revision.

All of these efforts should prove to be a real bonus to education. However, if we are not careful, we could be overwhelmed and confused by trying to select the appropriate pharmacy for each school and for each individual. Great effort should continue toward student developed curricula, but as that concept is growing, immediate resource materials are needed; therefore, educators must assess the current and future offerings. To do this effectively, there should be in each district some kind of "model" to follow as a process for reaching a decision about all the new curricular items being developed. No longer should the curriculum decision making process primarily be a review of basic texts by major publishing companies, summer curriculum grade level guide writing, and the eventual adoption of group requirements and materials. An entire new process is necessary.

Staffs need to ask which one, which ones, or which parts of which projects and publishers' materials make sense in their specific situations. No one project or book can be adopted district-wide or school-wide in a truly individualized pharmacy. Paperbacks and concept films further replace the need for basal texts; but usually most of the new projects or commercial materials, though often written for groups, still have some aspects of strength which through district revision and adaptation can be used in continuous progress programs. Further, generally the newly written national projects are superior to those a local staff attempts to write on their own; in almost all cases, a team of national writers can do a better job than teachers in a local school district; availability of time, money, and human resources usually make the difference. However, when they are not appropriate for an individual school or student, self-development of curricula still makes great sense, usually being the best approach; sometimes students can take ideas gained from the various books and projects and use them as a launching pad of ideas for writing or planning their own directions.

Where schools are considering the selection of various published media, some guidelines are necessary. Several groups in the United States have been working to develop specific criteria for making decisions related to curricular efforts. As a broad summary of the kinds of criteria that are being considered, the list below of ten general areas for the screening, selection, and purchase of new materials and programs hopefully will be of value as a point from which individual teams can build their own evaluative system.

The first criterion is, needless to say, to identify the PROBLEM which may exist in the district. Are the teachers and students really concerned about the present curriculum? Is there really an inciting factor which might lead to a desired change? What are the antecedents to the particular problem faced? Are there dissatisfactions? Before proceeding further, those suggesting the possibility of curriculum revision should be sure they have had it identified as a concern to those involved.

Criterion number two can be called ASSESSMENT; here the priorities, the strength of the involvement, the total process of how the staff is to analyze the problem, possible solutions, the resources available, and the questions of why might we want a change, and what we may want to change to are considered; the staff must assess the potential for revision.

If step one was to thoroughly identify the total PROBLEM, and if step two was to ASSESS the process of making a change, then step three becomes that of DIRECTION.

The teachers should identify a philosophy toward curriculum; they must determine their curricular objectives; they must consider what kind of a program they want in their school, what procedures they will follow in developing this program, and how they are going to evaluate the direction they have chosen. They must consider student input and the entire student developed curricula movement; how much voice will students have?

The fourth criterion is that of AVAILABILITY. Once the staff has identified a curriculum problem, has assessed their own particular situation, and has considered the direction they wish to take, they next look at what curricular possibilities are available. They must search the literature, search the lists and sources, contact and study the various projects, become involved with publishers of materials, and investigate the authors of the materials to determine some credibility toward the objectives of the program.

The fifth step is simply titled LEARNING. Here the teachers must look at the assumptions that have been made in the materials they are surveying, they must look at how the writers considered the learner and the learning process, what taxonomy of objectives were involved, and what research was relied upon in developing the materials.

Criterion six is that of CONTENT. Is the content proposed in the new package really relevant; what about student motivation? Is the content interdisciplinary? Is it individualized? Is it opened?

Criterion seven considers the ENVIRONMENT in which the materials are to be used. Do the materials consider the social realities of the existing situation? Do they blend with the programs already in use in the school district? Will the proposed new program fit the current organization of curriculum in the school? Does the program fit with the community prestige expectations?

Criterion eight suggests a look at the PRACTICAL factors involved in developing curriculum. What about the cost and the staff needed? How much time is required for in-service? What incentives are there to the staff? What are the facilities needed for the program?

Criterion nine is then the actual process of making the DECISION--an analysis of what the various programs which have made it through the elimination and comparison steps of the first eight criteria offer, and a decision as to which one or which ones or which parts of which ones might be appropriate for the district. As these evaluations are made, a discussion ensues as to whether the program should be adopted as a pilot or total effort in the district. Finally a decision as to whether to go or not to go with the particular program is made. The material under consideration could have been eliminated in step one, or two, or anywhere along the way through the criteria cycle for curriculum decision making. It could be that one of the proposals got as far as criterion nine, or perhaps several made it that far. Step nine then becomes a crucial decision. If the curricula under consideration gets past number nine, it is now ready for implementation.

Thus criterion ten is that of ACTION. Once the decision is made to accept a particular program, in-service training must be undertaken, the program must be implemented, there must be wide dissemination of the program, there must be feedback, and there must be on-going evaluation and further in-service. The tenth criterion leads around to criterion one again, to complete the cycle and start

the re-cycling. In other words, there must be arrows running in a continuous circle from the PROBLEM, to ASSESSMENT, to DIRECTION, to AVAILABILITY, to LEARNING, to CONTENT, to ENVIRONMENT, to PRACTICAL, to DECISION, to ACTION, and back to PROBLEM again. This organization becomes an on-going process which continually looks at the district materials. At each of the ten points, evaluation is an important factor; review must accompany each step. Decisions are made in almost all of these stages based upon evaluation. It might be that the search for new music materials may stop at step four, if in searching through AVAILABILITY the teachers find that there is nothing really new or nothing that they are not already using or aware of in the district. On the other hand, in the area of social studies, a group may continue all the way through the ten steps, actually implement, and then eventually revise the materials that were first adopted, as a result of continual re-cycling.

Completing the model for curriculum decision making is an indication that at each one of the criterion presented, sub-topics and discussions can be pursued. Under the concept of ACTION, implementation discussion could ensue; for example, in implementing a program in a nine months school, the June to September period could be considered the preparation period. This is the time when the material they decided to purchase actually arrives; the staff studies it, has a consultant in, studies it again, and then starts using it.

From October to January the reinforcement period occurs. The staff involved reviews the successes and failures of the program, they revise their methods, their consultant returns to help, they visit other schools using the material, and they attempt to refine the program. Finally from February through May there is the evaluation period, focusing on what has happened during the year. Individual as well as group and regional evaluations take place; there is feedback to the original decision, and plans are made for the following year. The entire idea of action implementation forms a complete cycle whereby June through June students and staff are involved with implementing and revising the curriculum materials; within this breakdown, emphasis is placed on various phases during particular months of the year.

When it comes to disseminating these decisions, such steps as planning conferences, hiring diffusers, writing publications, sending out invitations to visit, providing observations, arranging demonstrations, holding workshops, offering consultations to other districts, loaning materials, and making visitations can aid in the actual dissemination of the new programs and materials within a large district or to other districts who may be wanting to learn about the new curriculum selections.

The entire matter of organizing for curriculum improvement pinpoints another major change taking place in schools. In the past most districts have had textbook selection committees. They decided the books for the district. Grade level committees have written guides of content to be covered during the year. Supplementary materials have been on approved lists. Sometimes teachers in individual classrooms could select, but in most cases school or district decisions have been made. Once these were established, the teacher usually had freedom as to how to use the books in his or her room.

But now with the educational revolution, team teaching and interrelated curricula become essential factors in open schools. The early teams used the material on hand and were pretty much subject or departmental teams. They gradually wrote their own materials, adopted new project publications, and modified the use of the old texts. But required group-paced assignments were still the key. Then came the

concept of self-pacing and individualization, causing new concerns. Slowly students and teachers have adapted to these notions. The 1970's will mark an encouraging swing toward the concept that knowledge is not segmented but interrelated, thus forcing a complete revision of the teaming and curriculum development just completed in the 1960's to provide for a switch to interdisciplinary approaches to learning.

In previous chapters we have alluded to interrelating subjects--to the creation of inter or multi disciplinary teams. Several suggestions have been made as to how to start. At the risk of being redundant, some comments related to this issue seem appropriate.

Ultimately, as teachers are trained in this fashion, as buildings are built with more open spaces, as teaming replaces self-containedness, as materials are written for this concept, as technological advances descend upon the school, and as administrative reorganizations are completed, interrelated approaches will be the accepted and expected approach. At that time, the student will say, "I'd like to study rockets and I'd like to write a play, and . . . "--and immediately all kinds of combinations will swing into action. The former science teacher--still with knowledge and skills in science, but with strong interrelated cognitive training--will be needed to help the student launch his rocket project, but so will the industrial and math consultants in the design, blueprint, and construction stages. The art teacher may be involved related to the aesthetic effect of the location of the launch pad. The social studies person will need to help the student get permission to build on the selected sight; and as the individual prepares the proposal, the English teacher may be a resource. In writing the play, obviously the "old" home economics, industrial shops, art, music, and English teachers will be essential as consultants, in addition to the theater arts adults.

These various combinations of people formerly called subject matter teachers will become an interrelated team of consultants for the particular learning goals the student has selected at that moment in time. The team will disband when that particular objective is met; they could stay together, though, to help with the next goal, or may be together for other students; however, that certain combination of consultants may not be together again for several months.

Unfortunately, most schools are not ready to function in some manner of this type. The conventional schools have maintained math departments or self-contained rooms. The moderate schools have formed teams, or supposedly have formed interrelated teams, but which really only became multidisciplinary as blocks of time within the combinations were reserved, for example, for math, art, and industrial arts as separate subjects. The open schools have tried to provide interrelated combinations, but have not gone very far out in this realm, nor have they been exceptionally successful. Most have still talked about teaching math or art, and combinations of American Studies still separate English and Social Studies, though art and music have been interwoven, along with less emphasis on English as English. Thus the entire area of interrelating curricula--why we should, what can be merged, and how do we do it--is still a big stumbling block in education.

Therefore, until more experience and knowledge is gained in these procedures, and especially in schools where staffs have very little training, some plan must be developed as an intermediate step toward progress in this phase of the reorganization of learning. There is no one way to do it, no best way. In fact, there is really no way at all; at most, experiences and guidelines from schools trying can be shared so that creative educators can formulate a program that will fit their situation. The important thing is not how it is done in a particular school, but

rather that a start is made to move rapidly in the direction of interrelationships.

Four points seem to be of value in determining how to start. One is that by merging two or more of the former departments or grade levels, teachers have an opportunity to slowly learn how to merge their disciplines. Thus joining the science and social studies departments into an environmental team allows them to learn how to team, to learn what content might be merged, and to learn how to help students develop a curricula that pulls together various aspects of both disciplines. Starting by merging small segments of the school curriculum on a formal basis has helped a number of schools expand interdisciplinary concepts.

Another guideline seems to relate to keeping the teams or subteams small--perhaps 6-8 members to begin the undertaking--and then gradually expanding. Tied with this is the factor of physical location. Those who are to work together, especially in the beginning stages, need to trip over each other. Living together seems to enhance the potential; obviously personalities must match. Where personalities have some clashes, they can be housed in adjacent rooms, meeting less during the day than those who must live together. A fourth factor insists that there be some common ground in content and concepts so that it is easily seen that there are relationships. Science and social studies can quickly find mechanisms for working together on the problem of pollution. Art and home economics can easily work together on home design. These possible combinations are almost limitless.

The main consideration is that to break down departmentalization, there seems to be a need for a formal structure to help teachers, students, and administrators learn how to phase into this type of program. Each school must work out its own procedures. The size of the school certainly will have a bearing on the combinations; the physical arrangement of the building has a very definite impact on the plan. The existing structure of departments or grade levels will influence decisions as will the personalities of the students and faculty. A school with 20 English teachers, 18 social studies teachers, and 4 art teachers is not going to organize the same as a school with 2 English, 1½ social studies and ½ in art. Open pod buildings will be treated differently than three story long hallway structures. If schools-within-a-school are constructed, combinations again have different alternatives.

Schools which have developed interrelated programs have tried different combinations. Some big schools have had 35 teams, some middle-sized schools have had only 10, while some small schools have had only 5 or 3. With the aim of working around the individual, forming teams as needed, and/or by aiming toward one curricular interrelationship, the type of formal structure is important only as insurance that in this school hopefully this arrangement will provide successful learning experiences for adults and youngsters in the developing stages of the program.

There are numerous combinations which are practical mergers: science, health, and social studies could be an environmental team; home economics, art, and industrial arts could be the expressive team; and music, physical education, and theater arts could be a creative team. Actually social studies could merge with foreign languages and English, and/or with art, or music, or industrial arts, or theater arts or numerous other combinations. For multiple combinations, art, music, theater arts, home economics, and industrial technology fit together nicely.

We could go on and on with such illustrations. It is usually good to try to merge the old "academics" with the "non-academics" so that the school can eliminate the

problem of what is most important, but it is not always necessary. Again, physical space, personalities, materials, and perceptions of roles and curricular opportunities often play the center stage. The size of the teams and sub-centers desired has an important bearing too.

No matter how many formal teams are arranged, splinter teams must be encouraged. A splinter team might be a theater arts specialist in the creative team and a social studies major in the environmental team who join together with a group of students for a mini course in theater history. A number of schools have found splinter teams to be the best way to develop interrelatedness. They are more spontaneous, usually grow out of the interests of students, match teacher personalities, and allow for any combination of subject areas. In many ways this is close to the ultimate of eventually being able to develop splinter teams for each individual. Thus the more splinter teams in operation, the more interdisciplinary approaches in a school is a general observation. But as a stop gap to encourage this, and in order to insure that each adult is placed in a position for in-service retooling to learn how, formal teams still seem essential in the beginning stages. They further aid by placing some teachers and concepts in direct contact, thus easing the transition. Splinter teams are much easier to form in an open concept physical plant; the more formalized interdisciplinary teams seem more necessary in the egg-crate architecture. But in either case, the elimination of departments and grade levels is part of the goal. If we truly believe that knowledge is interrelated, not segmented, then curriculum development in a school must move in that direction.

When formal teams are organized, whether they are labeled by broad names such as Environmental or Creative, or thematic like Man and Nature, or all encompassing such as Fine Arts, or interlocking such as Humanities or World Studies, the key again is the breakdown of the rigid 12-15 departmental structure or separate subject syndrome. Yes, "science" can still be taught as "science" when appropriate, but usually most science can be interwoven with other pursuits. It is better to have a broader base to start from and then come back to a narrow base when necessary, than to try to expand from a tightly structured isolated and often insulated approach.

But whatever form of formal or splinter organizations are established, "show and tell"--interaction among all segments of the staff is needed. Thus a system of rotating groups should be established to insure that those in art know what is developing in the expressive team--or that the splinter group in theater history knows what is occurring in the splinter group called business systems. We have failed for years in conventional schools to accomplish this task. The English teachers have rarely known what was happening in math, nor have the 2nd grade teachers known the program in the 6th grade. The new interrelated curricular approaches are merging vertically and horizontally.

Obviously all this curriculum development is going to call for a massive pharmacy of materials as was mentioned in the chapter on individualized instruction. Hardbacks, paperbacks, ditto sheets, loop films, movies, tapes, and all such kinds of resources are essential. This means not only must materials be available in the team centers, but a tremendous support area called the media center must be provided. A centralized media arrangement usually overall seems to be the best, but satellite centers reaching out as an arm of the central area can be established.

Many schools today do not even have the old traditional library, especially at the elementary level where they are still found in only 30 to 40 per cent of the

buildings. Most high schools have limited seating, usually for only 10 per cent of the student body, and shelves are often bare. Yes, the new flexible school buildings of the 60's have provided for resource centers; generally these have been carpeted, and have more materials than ever before. But even these are a long way from satisfactory; they are certainly not geared, in most cases, for the coming technology. The really sad thing, though, is that the overwhelming number of schools in the United States have completely inadequate library services; often the old library is still seen as an escape from study hall or a place to march the students to once a week to check out two books.

How many schools have one professional media specialist for each 200 students up to 1000 plus one more for each 300 beyond that? How many have a one-to-one library aide to professional staff ratio? How many spend at least 3 per cent of their district budget for printed materials alone? How many provide between 27 to 35 square feet (elementary through secondary range) of breathing room for each student exclusive of stacks, offices, conference rooms, and audio visual equipment? How many provide space for a minimum of 30 per cent of the student body?

Each school must work out their own arrangements as to media centers. There again is no one answer. But it is clear that if schools are to develop inter-related curricula, multitudes of resources, and huge media center type facilities must be available. Part of the area should be a quiet zone, but much of the media center now should encourage noise--discussion, viewing, and the present rumbling of pieces of machinery. These developments do not occur overnight, but with effort, in a three year period, adequate resources can usually be gathered in most schools.

The 1970's will witness gigantic strides forward in all areas of curricula--whether student, adult, or mutually developed. All this chapter has been able to do is summarize what has happened in the 1960's. Unfortunately, about 84 per cent of the schools in the United States presently fail to reach these 1960 goals and achievements. Thus the 70's must provide a dramatic catchup period for most, while some continue to explore and adopt those exciting improvements in humaneness and technological aides which will provide the impetus for the decade of the 70's.

Chapter 15

Requirements and Graduation

Another series of "how" questions constantly asked throughout the country relates to the title of this chapter. In open concept schools, with no graduation requirements, how do students know when they can graduate? Will colleges accept students without credits? How do you give diplomas if you don't follow state graduation requirements? What happens when a student transfers from an open school to a rigidly structured school before he graduates? Can students enter before the magic kindergarten entrance date? Aren't there any sacred courses--surely students need English to live in the United States; what if they don't learn to read in the primary years? How do you fill out forms for insurances and scholarships that require class rank? We could go on and on with such typical inquiries.

Rather than elaborate philosophical or proposed answers to all these, guidelines which have actually been used in schools are presented, not as "the answer" or "best approach," but merely as examples of how some schools at given moments in their transition solved these realistic problems. Nationally a number of schools have operated under an open philosophy regarding requirements, and to this date, students have not seemingly been handicapped in terms of graduation from other high schools, transfers to graded elementary schools, entrance to college, or future vocational advancement. Hopefully, the following statements will be helpful to schools making decisions related to the questions asked in the opening paragraph. The approaches described are certainly not answers for the 1930's, but they have provided temporary 1970 solutions that work in the practical world.

Open schools do not place great emphasis on "graduation" or diplomas, as they believe learning is a continuous, life-long process, and that generally more "education" goes on outside the school building than within it. Learning how to learn is generally more important than the specific knowledge that has been acquired in a specific area. The individual's self image and the achievement of success in many affective and psychomotor developments are generally more important than those in the cognitive or content knowledge areas.

However, unfortunately, or fortunately, depending upon an individual's philosophy, the present society in the United States places great emphasis on competition; the measure of success is often a paper received after completing arbitrary standards, but because this is part of contemporary North America, schools are obligated to provide guidelines for completion of what is now referred to as high school. This chapter tries to explain requirements in open schools and the information which must be given the students. Most educators already know this information, but continue to follow the old patterns. Hopefully, this discussion will lead to the creation of more flexible schools.

Under the present varying state laws requiring attendance, usually from about ages 7 through 16, unless a student is excused by the state from this obligation, he or she is in school during the years covering the traditional grades 1-8. Most students start in kindergarten. Therefore, for the nine years from K-8, or the 10 or 11 years if a student begins at age 3 or 4, in truly open schools there are no "graduation" or promotion requirements other than to generally be in school approximately the 175 days per year requested by most state regulations (a year in a year round school signifies within a 12-month period, not a 9-month session,

as in most schools), and hopefully make progress in the affective, psychomotor, and cognitive domains. The effort is to have each student receive personalized programming according to his or her relevant needs, interests, and abilities on a continuous self-paced basis. Therefore, there are no promotion or retention standards during these years. School is considered a continuous 11-year flow of individual growth and development.

Starting with the 12th year (assuming a student enrolls at age 3), or the 11th, 10th, or 9th year of "formal education" depending upon whether the student begins school at age 4, 5, or 6, if not at age 3, slightly more rigid requirements are imposed upon the student in order to receive a "high school diploma" which will entitle the individual to apply for certain jobs or colleges. Unfortunately, most of the conventional requirements of the past are based upon invalid stumbling blocks originating from unresearched national decisions. However, at the present time, it can be anticipated that the great majority of students will stay the traditional four years beyond the 8 to 11 years of school already completed; for most students this means starting the final four years at approximately age 14 or 15. Since "time" spent in school is not really a valid evaluation as related to achievement, students should be able to speed up or slow down their work. For example, students may go more than 175 days per year, or may achieve significant growth at a rapid pace in less than 175 days, or may have more pressing needs or opportunities elsewhere and thus should "graduate" in less than four years. By the same rationale, they should be able to stay longer than the four years usually enrolled. In all cases, four years is only a general guideline base from which to make judgments.

A student should be entitled to a diploma if enrolled four years of approximately 175 days whether actually studying most of the hours within the building, or part of them in the local community or some other area of the world. During this time the school and the parents may expect the student to make progress in the affective, psychomotor, and cognitive domains through the areas of study selected; the goals and achievement of this progress are determined by conferences held between the students, consultants, and advisors. A student may spend more than the four years in school if the student and faculty deem it profitable. The final awarding of the diploma remains the authority of the school if there are conflicting points of view. Hopefully the four year syndrome and state laws will be revised to provide more meaningful options for those who are not able to benefit from additional time in a high school.

If a student wishes to leave in less than four years, the request should be made through the administrator in charge of enrollment. A conference generally should be held with the student, parents, and some of the staff to determine if this seems to be in the best interest of the youth. Usually, a student desiring to leave in less than four years should plan this with his advisors and the administration in advance so that decisions related to expectations can be made and goal achievements set. Again, in all cases, the school should reserve the right to make final judgment. However, increasing numbers of young people should graduate early. Often physical maturity leads to resentment of compulsion, boredom, and inactivity.

Open schools do not give credits or Carnegie Units or other such standard badges of completion of courses. Because there are no formal classes set up and required by the school, the "courses" a student pursues must be determined on an individual basis. The work the student completes can be recorded on the transcript of record in terms of areas of study as identified by the "title" given to the experience

pursued. The school is more interested in "learning experiences" than in the completion of an arbitrary "course."

However, students should be forewarned and aware of the regulations imposed in most schools and colleges throughout the United States. Though open high schools are not concerned with credits and required courses, most high schools are. Therefore, if students contemplate possible transfer, in making decisions about learning opportunities, they should be well aware of the fact that most schools generally require the following: 4 credits or four 9-month years of English; 3 credits or three 9-month years of social studies; 1 or 2 credits or one or two 9-month years of both math and science; two years of physical education, but often without the reward of credits; and 1 to 3 courses each year or 1 to 3 credits, usually totaling 5-7 credits, of "elective" courses. These can be additional ones in the areas above, or can be in such subject fields as business, art, music, industrial arts, home economics, or foreign language. In summary then, in schools housing the traditional grades 9-12, students are generally expected to enroll in five courses per year, earning at least four "credits" per year as determined by the teachers of each course, or 16 credits plus two years of physical education. Requirements do vary from state to state.

Humane schools believe these requirements are irrelevant to many. There is no research to support them. The belief is that if there are requirements, they should be more balanced: art, music, home economics, and the other subjects should be included. Certainly four years of English, no art, and only two years of physical education is not the best requirement for ALL students. Some schools have a series of prerequisites--a course which must be completed before another course can be taken: algebra before geometry, art I before art II. Flexible schools try to avoid all such mandates, but students should realize that most schools still have them. Further, open schools would rather have students work in interrelated areas such as humanities, environment, and human relations, rather than in subject areas such as math, science, and music. Knowledge is interrelated, and as much as possible, students should work out "course titles" with broad interrelated possibilities and experiences. It is possible for a student to concentrate in nothing but one subject, but students are encouraged to select over their years in school a balance in the diet; in other words, the philosophical recommendation is that students should take some work in all areas related to the old subject disciplines. Thus, home economics, industrial arts, art, music, physical education, business, foreign language, English, social studies, theater arts, science, math, and other such areas should receive attention from most all students. If requirements were to be imposed, they would be balanced.

If a student takes work approved at his home school, but which might not be accepted by another school, and a sudden unexpected transfer of the father would imperil high school graduation from another building, flexible schools should act in benefit of the student and give "traditional credit and course titles" on the transcript to be forwarded to the other school. This translation can be achieved by the school counselor with the approval of the student, his advisor, and the administration. The final decision related to the translation is that of the school, in case of conflicting views. Remember, however, the counselor cannot translate nothing into something; the student should be reminded that he is expected to pursue learning opportunities. These opportunities are, however, very flexible and varied, and if approved by the student, advisor, and parents, the choice is generally accepted as appropriate by the school for transfer and graduation requirements. For example, it is easy to translate work in astrology into English, social studies, or other areas of transcript need. Broader titles, such as Creativity, Expression,

Environment, Systems, and Communication can also be thusly interpreted.

As will be stated in the appraising and reporting student progress chapter, the final decision and responsibility for selection of courses lies with the students and parents. The school should offer advice or counseling when desired; if a student decides not to take English the "junior and senior years," it is acceptable to the open program, but the student should realize that some high schools (in case of transfer) and some colleges require four years of English. The open school might suggest less than four years of English in order to take art, music, and other subjects, but the student should thoroughly understand that art is not as important as English in most schools--only in humane programs and in art schools.

For those anticipating entering college or university, technical-vocational schools, business or fine arts schools, the general and specific catalogs from these institutions should be consulted. Students should clearly understand that though generally college entrance requirements follow the pattern as listed of 4 years of English, 2 years of social studies, 2 years of math, 2 years of science, physical education, and elective courses, particularly in the areas of the foreign languages, that individually they do differ. A number of them want heavy concentrations in math and science; others prefer work in the humanities. An engineering student obviously is expected to pursue more math than one interested in being an English teacher. Some colleges, particularly two-year public community colleges and many state institutions, have an open enrollment policy; in other words, anyone may enter with only a high school diploma or its equivalency. Others, especially certain private schools, have very rigid requirements. Vocational, technical, business, and fine arts types of schools generally have flexible enrollment policies. Most prefer high school work in the area in which the student expects to specialize; some require a great deal of work in the specialization area before entering, but others require none. For example, if students want to become foreign language interpreters, they can enroll in most foreign language institutes as beginners. Though educators know all these things, the students in an open school must have the same knowledge.

As indicated, credits, such as one credit in English, are not given in humane schools. However, credit can be talked about in terms of recording the progress made toward a goal the student is trying to achieve. For example, it is to his or her credit if the student has learned to count in Spanish. If students are concerned about Carnegie type "one credit" for English courses, they can consult with the teacher to request or see that they are doing approximately the same work that would be one credit in a traditional school as related to transferring or college entrance. However, they should not request credit from their teachers in terms of how much credit do we get? No "credit" should be recorded on transcripts of students, and only in cases where the student would be prevented from pursuing other work because of the lack of a "paper record of such credits" would the work need to be translated into credits by the office.

Remember, too, that free schools are often experimental schools, and a student who makes the decision to enroll for certain benefits should be ready to accept the risks that go with new programs. In these schools the student must have the courage of an EDUCATIONAL PIONEER and thus be ready to accept the possible benefits and consequences of such a program.

Athletic eligibility is considered under the same philosophy. All students enrolled should be eligible up to the age cutoff date or total years of competition.

The only reason to honor these regulations is to prevent "professional high school players," but they should be flexible. However, no attention should be given to those requirements based on grades in subjects and passing credits. Football may be the single most important subject for Pete, in the affective, psychomotor, and cognitive domains. As long as football is part of the curriculum and paid for by the school, he can play football under the same criteria as he can enroll in math. Obviously in this philosophy, the entire notion of prerequisites is obsolete except in perhaps very limited circumstances.

Regarding entrance, the school should operate on an open, volunteer attendance policy. Anyone presently living within the confines of the legal school district should be eligible for enrollment. However, if space is limited, enrollment policies may be established; the school should reserve the right to accept or reject enrollment, not on the basis of race, religion, or economic status, but on the maximum enrollment figures set by the school.

If the school has room, almost everyone should be accepted. However, when the school is overcrowded with waiting lists, some students must be rejected. Factors such as "mutually beneficial" to both school and student, diagnostic needs of a particular student, support by the parent of an open program, balanced economic and racial percentages, location of the home, transportation considerations, the percentage of college degree families, and balanced percentages of age and sex enrollments for experimental purposes and program development are among those to consider when accepting or rejecting a student.

The majority of students in the district will fall in the age range of 5 through 18, the old kindergarten through 12th grade. However, there must be at least limited efforts to develop 3 and 4-year-old programs. Birthdate should make little difference; as long as there is room and the student is near, at, or over age 3, he or she should enroll at any time. But because the demand is usually so great and staffs so small, limitations are necessary. Though the age cutoff dates in most states as now written are absurd, when enrollment cuts are made, birthdate may be considered. If the child could be sure of staying in the open district, no problem is encountered. However, if the youngster would transfer before completing the traditional first grade, the child could be denied entrance in another district because of age; thus early enrollment could be a potential disservice to that child. In all cases, though, every effort should be made to accept everyone and to consider individual differences whenever possible, but practical realizations of time, space, staff, budget, and laws must be faced. For example, public free schools now receive no financial support for the 3, 4, and full-day 5-year-old early childhood programs. Private free schools can charge limited tuition.

Open schools should be connected to college programs more closely. Many high school students, with permission of nearby colleges, should take college courses. Some of the college teacher education majors should receive part of their learning experience in free schools. Hopefully, more non-major and teacher education undergraduates will participate in open programs, as well as graduate students in professional education. The start may take place by an eventual merger on a formal or informal basis of the new experimental colleges and the new experimental teacher education centers within the colleges. The goal is to eventually have open schools available for precollege, general college, and undergraduate and graduate teacher education students. Under a confederation, school districts and nearby colleges could establish three interrelated divisions: precollege division, general college division, and teacher education division. This could insure students that from age 3 through graduate school they could attend open schools with flexible entrance,

transfer, and graduation policies. In all these fluid arrangements, open schools must realize their obligations in regard to limitations imposed by society at present. Much of the program depends heavily upon discussion, counseling, guidance, and decision making with each student.

Parent input is important if they have specific concerns. For example, even though the school does not make math mandatory, Mom and Dad can counsel the student into that area if they feel strongly about it. Sometimes students can be led to an area through guile and cunning. The student who wants to learn to make biscuits must read the recipe. Sift, mix, blend, stir, tablespoonful, and other such words become meaningful in the vocabulary and reading becomes important. Math even enters the picture--1/3 of a cup. Additionally, diagnostic teams of teachers should meet often to discuss possible prescriptions for motivating the student toward an area of concern. However, parents and staff should refrain from pressure tactics unless that approach seems best--remembering that it seldom is the answer.

Finally, the school should reserve the right to "require" something if it is felt absolutely crucial. If a driver in an auto accident is badly hurt and unconscious, and he can't sign the permission slip, nor can any next of kin be located, the M.D.'s will decide to operate, assuming that the patient wants to live rather than die. The fact that the patient would rather die is not known to the doctor, or perhaps would be rejected as a reaction from shock if he did awaken, and surgery would go on anyway. The staff should try not to "force" a student to take any subject, but should reserve the right in what they determine as a "life or death" unconscious situation to make such a final decision--though it should rarely be used. What becomes the final focal point, then, revolves around the question of what seems essential for the intellectual and emotional development of each patient. The biochemists can say that protein, oxygen, and other such items in specific amounts and forms are essential for life, and can be fairly certain. But what can educators say for certain, especially related to curricular decisions. Many educators have opinions; most might say reading is essential, but is it really--in the present and developing age of technology?

What subjects are really essential? Is art really essential for intellectual and emotional health? Is the study of the War of 1812 really essential? If so, how much study of it is essential? When is it essential--at age 8, or 12, or 17, or every year? Why is it so important? Is it important for all, or just a few, or maybe many? Curricular decisions force the schools to accept tremendous challenges and tremendous responsibilities as the staff assumes they can make valid judgments about young people which could have profound effects on their future.

The ultimate answer again relates to humaneness and relevancy. If each individual has a program designed as nearly as possible for that person, considering factors found in society, and if the individual has great input into those decisions so that motivation and retention are considered, then credits, graduation requirements, entrance ages, and all other group prescribed solutions really have relatively little value in the education of youth and adults. If the biochemists are correct, that each individual is so different in so many ways, then the only plausible answer for educators is to treat problems of entrance, graduation, and adult vocational preparation on an individual basis. Thus schools should reject the notion of credits and the imposition of unresearched state requirements designed for the masses, not for the individual.

One of the questions currently posed to staffs of open schools relates to the acceptance of a more flexible curriculum policy by the colleges. The general

concern is that graduates of open schools could not be accepted at the leading colleges and universities. This has not been proven to be true. In fact, surveys show just the opposite. Communities all over the United States are ready for this change.

As just one small bit of evidence that the country will accept revision in education, included here is a letter sent to a random selection of colleges and universities throughout North America regarding entrance to college without grade point averages, Carnegie Units, class rank, and traditional grades. It is essential that graduates of open concept programs be admitted by other criteria, for these schools believe very strongly that traditional rankings are a distinct form of discrimination. They do not separate the Catholics from the Lutherans, the Blacks from the Whites, or the Rich from the Poor; therefore, they refuse to partake in a system which calls for discrimination between the Smarties and the Dummies, and that is all that grade point and class rank accomplish. Unfortunately, the case will probably have to be heard by the Supreme Court one day, but there is great confidence in the ultimate verdict. In the meantime, more and more educators and parents are agreeing with this position of revolt against discrimination.

The response from colleges who agree with more flexible admission policies has been overwhelmingly favorable. All were willing to consider students on the basis of different evaluations. In the early years of operating without class ranks and G.P.A.'s, applicants from open schools have not been rejected for admission by the college of their choice because of the lack of rank or averages. Some students do not make their first choice on the basis of keen competition, S.A.T. scores, or other personal factors, but all eventually are accepted by a college satisfactory to the student.

Further, all of the students who have graduated "early"--those who leave in less than four years--have found that the opportunities which developed proved to be sound judgments on their part and a humane policy by the schools. Students have been able to solve personal problems, enter colleges in winter and spring terms, enroll in vocational opportunities, start full time jobs which eased financial difficulties, and in many additional ways capitalize on the decision. Other students have found that the best policy for them has been to remain four or more years in "high school."

The early efforts at new "graduation" criteria have been tremendously rewarding; if the future continues as bright, perhaps the impact of the open schools which are attempting to break the lockstep will have made a significant contribution to education in the United States.

Below, as a specific illustration of the statements above, is a letter sent to admissions directors in the early phase of the Wilson program which shows what every high school can achieve. Following the letter are excerpts from the answers received from the colleges. The admission directors are most willing on an individual basis to consider acceptance of all students who present applications for enrollment.

Letter to College and University Admissions Offices - September, 1968.

Dear Sir:

The Wilson Campus School is a laboratory arm of the School of Education at Mankato State College, and as a school supposedly funded by the state legislature for the

primary purpose of being involved in research and experimentation in education, has decided to undergo vast revision this year. In the past, this school operated a good conventional program. Until July, 1968, we had self-contained classrooms, a regular period 1, 2, 3 type of schedule, study halls, ABC report cards, honor rolls, and the other usual programs found in conventional schools. Because we were doing very little different than the public schools in the state, the possibility of closing the laboratory school was given much consideration. After deliberation, it was decided to keep the school in operation, but to make it into an open evaluation oriented endeavor.

We are enclosing a brief summary of the efforts we have undertaken since July, 1968. We have started the three-, four-, five-year-old programs as indicated. We are building the entire schedule, K-12, on a daily basis. We have developed team teaching; instruction is primarily through small group and individual efforts. We have students taking self-directed and partially-directed classes. We allow them a great deal of freedom and are working with the students to assume the same amount of responsibility.

We do not believe in failing any students; generally a failure is the fault of the school for not providing the kind of program which would be of value. Many times these students have problems in the affective domain which need to be corrected before the cognitive areas can be improved. The student is not given credit for the completion of the experience until he has accomplished it to the satisfaction of the teacher. Therefore, he does not fail--he just does not complete it; nor does he make the honor roll, as we do not have one. We are interested in individual growth, not group comparison.

One of the many changes is an attempt to improve the evaluation of students by providing something better than the traditional ABC report cards, K-12. The system involves many individual conferences between the teacher and the student, and the student and his advisor. The conferences culminate with individual parent conferences. The entire program is based on a diagnosis and prescription philosophy. One of the major efforts is to individualize instruction and to develop self-paced, continuous progress programs. We feel that this is the best plan for the majority of the students, and that grade point averages, class rank, and ABC grades have little place in the evaluation of individual students. "Grades" only had success as long as we were concerned with group structure and group prescription.

The effort at evaluation is based on an initial diagnosis of the individual student's needs, interests, and abilities. Based on the diagnosis, we then try to prescribe an individual program for each student. Generally, every two weeks we try to evaluate the progress made by the individual student, and on the basis of that evaluation, continue the original program, or prescribe a new one, as determined by the amount of progress the individual has achieved in the preceding program. We feel that if we are truly going to personalize programs for boys and girls, we must be student oriented; they should not be forced to fit an adult-designed curriculum offering little relevance to the student. Of course, for students who are planning to go to a specific college, we suggest that they take the courses that fit the demands of that school.

Whether we are successful or not remains to be tested. This is the purpose, as we see it, of a laboratory school in the state; no matter how good we may think current educational programs are, we feel that Wilson should be different. The role should be to pioneer new approaches to education; we are not going to know if the idea may be a better way unless someone makes an effort to try.

It is easy to evaluate K-8 children; we keep folders on each student; the teachers and parents are continually informed of the student's progress. However, at the high school level, in addition to completing the same evaluation as we do K-8, we are attempting to work out a format which will satisfy employers and college admission offices as to a record of the student's success in high school, and indicate a prediction for future potential. At the present time we have not created a finalized format, but generally see it first as a description of the program undertaken by the student, and second, as an expression for the future. We expect to be able to state the objectives the student attained; we probably will include standardized test results and subjective teacher evaluations as well. We see this as a much more meaningful description of the student than a grade point average and class rank.

Our purpose in writing you at this time is to request your reaction to these questions:

- (1) Because we are a laboratory school for the state, would you be willing to accept students on the basis of an evaluation which would not include conventional requirements such as class rank and grade point average?
- (2) We are attempting to pattern a program through which we might find a more meaningful way of admitting students to college and at the same time relieve the high school program from being restricted by college entrance regulations. We do not want to hurt any student's chance of enrolling in college, but we do sincerely feel that grade point averages have no place in individualized education. Would you be interested in joining with Wilson and other colleges and universities to develop a meaningful format?

Because we are a small school, we are not sure if there will be any students applying for admission at your institution this year. However, we are interested in corresponding with a cross section of the United States so that what we develop here would be applicable anywhere. Additionally, since the change in direction here, many students are interested in going to college wherever they might have an opportunity to participate in a learning environment similar to that which we hope we are developing at Wilson.

We look forward to your reply to these proposals, and would be interested in working with you in an attempt to improve the evaluation procedures for individual high school students.

Sincerely,

Don Glines, Ph.D.
Director, Wilson Campus School

Responses from Colleges and Universities

"Suffice it to say, however, that you can rest assured, as far as _____ is concerned, that the absence of the usual badges such as rank and grade average will not work against your students--we lean heavily on other kinds of evaluations anyway, so that your own recommendations, and those of your staff, CEEB scores, particularly in achievement tests, can help to provide many of the answers we normally seek in the usual fumbling of the admission process.

"I think we would be interested in joining with you and other colleges to pattern some kind of program; certainly if we cannot do this institutionally, I can work with you personally, for I am much interested in the directions in which you are moving (indeed, your letter did much to destroy some stereotypes I had about places like Mankato, Minnesota!)"

"Please know that this institution would give every consideration to graduates of the Wilson Campus School who might seek admission to the University of _____.

"We realize you would not be furnishing us with grades or class ranks in the usual sense."

"We would have to know the specific pattern of subject matter the student has completed. We of course would have to have test data (we require the ACT). The key thing we would have to know is whether or not this student is recommended to us. In other words, do you believe he would be successful in his academic endeavors at the University of _____? We would insist that you give us such a statement, in the absence of grades and class rank which we have been using as predictors for success here."

"Thank you for your letter of December 12 in which you have described your efforts to revitalize the experimental nature of the Wilson Campus School. I assure you of our enthusiastic support for your activity and our willingness to cooperate in any way possible."

"Specifically, we would be more than willing to consider applicants for admission to _____ from your school even though they might not present the traditional credentials. I assume you would be able to provide us with sufficient information concerning such candidates and their academic achievement so that we might make appropriate evaluations of their eligibility for admission. We would continue to require them to complete the Scholastic Aptitude Test and three achievement tests of the College Entrance Examination Board."

"We would be willing to consider joining you and others in the development of a program leading to more meaningful ways of college admission. I hope you will keep us informed of your progress from time to time."

"Many of the points that you have raised in your letter have also been discussed by the faculty and administration at _____ concerning educational programs for young men and women entering college; therefore, I think that there should be no problem in working with you in having your students accepted at _____ based upon your recommendation. We are attempting at _____ to de-emphasize the grades similar to your program; therefore, we do not figure a grade point average on any of our students here at _____."

"There would not be any difficulty in _____ accepting Wilson students on the basis of an evaluation presented by the school supplemented by the student's SAT scores and an interview by an admissions staff member. We would also be interested in joining other colleges in an attempt to improve the admissions process."

"Thank you for your information concerning the program at Wilson. You have prepared a very interesting and provocative statement of your plans and procedures. _____, too, is an institution interested in innovative and experimental procedures. We therefore look with a great deal of favor on your type of program, and would be happy to work with you on college admissions that do not include conventional requirements.

"I would be happy to further explore the problems and possibilities of your program as a college admissions concern. Frankly, if we have a reasonable description of the type and amount of work attempted by the student, plus your own evaluation and anecdotal record of students, plus the CEEB, SAT or other standardized test score, I think that a decision that is fair to all concerned can be made."

"I am certain that our Committee on Admissions would be most willing to consider your students on the basis of an evaluation which would not include the conventional class rank and grade point average. In lieu thereof, I am sure that we will find much additional data to assist us in evaluating these students.

"I am certain that we would be very interested in at least discussing the possibility of joining with you in an effort to pattern a program which may lead toward different and more meaningful ways of admitting students to college."

"I was most interested in your recent letter telling us about the Wilson Campus School. The program sounds exciting and I feel sure that the youngsters going on with their education from your institution will have benefited greatly from their experiences there. _____ is attempting to put into practice on a somewhat larger scale what you are attempting to do in your laboratory school. I am taking this opportunity of inviting you to visit the _____ for I am sure we can both grow through the exchange of ideas."

"Any university will take an anecdotal record in lieu of A's, B's, and C's. The Eight Year Study (the Harvard Report) indicated this many years ago. All a university would like is an accurate description of the student's accomplishment and level of performance."

"In our admissions program, we are not inflexible regarding secondary school transcript requirements, and over the years we have had a considerable amount of experience with so-called unconventional secondary schools that follow a system of written evaluations rather than grades and no ranking procedures whatsoever. We can work with this kind of unorthodox reporting system quite satisfactorily, and the candidate in question is not in any way handicapped as a result. I might add in passing that _____ has moved away from a conventional grading system this year, and we are now operating entirely on a credit-no credit plan."

"Thank you for your truly enjoyable letter. Even though your students have not applied at _____, we would be happy to accept them. I only wish that more educators would try some of the things you people are doing. Keep up the good work!"

Chapter 16

Reporting Student Progress

This chapter offers no magic solutions. But among the most often asked questions are those relating to student progress: "In these open type schools where grades, class rank, and report cards are not given, relying instead on individual conferences, how do you ever evaluate and report what the student has or has not achieved? We don't want theory or what might be done. We know there are probably many possible solutions; but right now we desire a workable model to consider so that perhaps we can blend various ideas as a way of starting."

Therefore, for purposes of this chapter, rather than describe the numerous plans, one procedure for appraising and reporting student progress is presented, followed by some suggestions for alternatives. Without spending hours, weeks, or months of planning and discussion trying to perfect a system, methods must be quickly accepted by a school eliminating report cards in order to allow the new program to function. Schools have tried required parent conferences, "blank check" parent information requests, and other types of written forms. None have been 100 per cent satisfactory, but all have usually been better than A, B, C type marks.

No one is asked to accept the suggestions which follow as the final ultimate form. Rather they are presented here as a practical example of how a staff can undertake change. A decision must first be made to abandon the traditional reporting system; next, several experimental efforts are usually necessary before a staff finally is somewhat satisfied with the results. Usually within a year or two, if not sooner, the staff again finds their system obsolete, or in need of further revision. Staffs adopting open school patterns must consider new methods of student evaluation and need concrete suggestions for how to begin; they then must wrestle with their own format.

For example, the present "Experience Record" form which is included in this chapter will not be in use long as schools will soon be able to eliminate most all references to traditional subjects and present team arrangements. Local school terminologies such as expressive, creative, system, environment, and communication have generally just caused colleges confusion at this time, and further require a tremendous amount of clerical work and interpretation. Thus, as a compromise, for the moment, it is probably easier to use the traditional subject listings, though soon should come some type of interrelated report. The combinations presented here are not necessarily desirable in all schools; they may happen to fit a particular development in one school at a given moment in its history. It does give a way to record "course titles" without reference to ABC, or credits, or grade in school, or even length in time, such as weeks spent in a course, or whether the experience was a mini involvement, a midi effort, or a maxi in-depth study. The presented Experience Record, though, satisfies many needs now as it does give future employers a perspective of the areas of interest and balance of the diet selected by a student while enrolled. The following paragraphs describe a philosophy and methods which might be used in a school in 1970. Hopefully, they will offer ideas for a creative staff to help develop new means of evaluation in the effort to overcome tradition.

What is worse about staying with the traditional labels is that they perpetuate the continuance of segmented knowledge. Instead of being considered a person, or an individual, Mr. X is known as the art teacher who teaches the art courses; this

must cease. People--adults and youngsters--should develop relevant curricular experiences by pursuing common interests without regard to labels for courses or teachers. The day is coming; therefore, this method of recording experiences is not what we ought to be doing, but is only bowing to the reality that as we start the 70's, only a minority of students, faculty, and parents are willing for such a "bold," but long overdue, conservative step. Thus the forms here are immediately usable as a transition step for those who need to move through an evolutionary strategy.

The plan suggested here calls for two, three, or four formal attempts at appraising and reporting student progress each calendar year. In addition, dozens of other informal evaluation sessions related to each student's progress should be held. Theoretically, each student each day should appraise and report, at least to and by himself, and/or with the teacher and advisor, and/or parent, the progress made daily. From a practical point of view, this does not happen. However, as much evaluation as possible is encouraged under the guidelines described below.

On selected dates--perhaps March 10, June 10, August 10, and December 10 of each calendar year--or any dates desired--student progress reports may be given to the students to be taken home to the parents. These evaluations are carbonized in quintuplicate; the blue (or any color) copy goes to the parent, the red copy to the file of the advisor selected by the student, and the yellow copy to the student file in each team center. The fourth green copy is the school record. It is maintained in the planning center until course information is copied on the permanent record, and for reference for parent or administrator conferences. They can be discarded at periodic times and replaced by later reports, but preferably are kept to help figure records for students transferring to traditional schools. The fifth buff copy is a preliminary form which goes to the advisor fairly soon after the decision to become involved in new programs during each reporting period--or whenever a student selects other experiences; this provides the advisor information on student goals set or experiences desired, and gives assurance that all staff members are consulting with each student regarding selected learning opportunities. The final report during each period of time is completed through individual conferences held between each student and teacher prior to the chosen dates. The advisor keeps all of the advisor copies for all the four "high school" years. This becomes a bulky but extremely valuable package of student progress and forms a basis for evaluations for the future. For "elementary" students, the forms are kept for a year and gradually replaced by the new reports of the following year.

The report months chosen are not magic and other dates can be and are used. Some set date has been found helpful to assure an appraisal that may otherwise be neglected; it does aid in communication between various team members, advisors, students, and parents. Because of the coming of 12-month schools, four seasonal dates might be selected: spring, summer, fall, and winter. Further, as student interns are usually available at present from colleges for one quarter only, and because teacher contracts in most districts are still issued on a fiscal year basis, it is sometimes desirable to have the evaluations near the end of each college quarter so there is still time for any desired parent conferences or comments related to student work with a college intern. However, if only one or two such reports are developed, information may be accumulated through comments left in the student's folder.

The formal evaluation form consists of four parts. At the time the student determines, in conjunction with the teacher-consultant or team of teacher-consultants,

what he or she desires to pursue, the general goals, desires, or objectives in very abbreviated form are listed for the affective, psychomotor, and cognitive domains (they do not need to be identified as such, but the staff should be aware of progress in all areas and discuss them with the students). These generally are short descriptions; they can be in behavioral terms or only in descriptive notes which might merely say "still exploring possibilities," but at least the advisor has some information on the advisee. There should generally not be excessive pressure on the student to start, but there is a need for communication. The total summary is only one page. Toward the evaluation date, the student and teacher sit down to discuss whether the original goals have been exceeded, reached, or not attained. This progress is then noted in the second section of the report.

During or after the conference with the student, there is a third section where the teacher can make additional remarks from his or her own point of view. The report is then sent to the advisor. In this way the student's counselor-advisor receives copies from all the learning teams or teachers with whom the student works. The "subject" teacher-consultants only know what the child is doing in depth in the specific team; the advisor, however, may have 2, 3, 5, 7, 8 or more reports, depending upon the amount of involvement of each student.

The fourth section of each report is filled in by the advisor-counselor during the conference held with each advisee. Time is taken from a specific school day to provide an opportunity for these sessions to occur. The reports are then forwarded to the planning center where the red, blue, yellow, and green sections are separated. The buff has already been torn off after the first weeks of the experience and forwarded to the advisor as the preliminary report. The blue is made available for the student to take home or for the parent to pick up. The red is returned to the counselor-advisor. The yellow is returned to the team center; the green is maintained in the planning center to record any pertinent information in each student's permanent record folder.

At the bottom of the regular one page Progress Report is a space for teachers to record "titles" of any "experiences" taken during the report period and to mark them "completed," "continuing," or "discontinued." The completed experiences are placed on the Experience Record described later. Further, there is a note at the bottom of the page to encourage parent comments, by a letter from home or personal conference.

Teachers are encouraged to hold conferences more often and most do. Some students are involved often with one-to-one evaluation sessions, while others have less need. Sometimes the conferences are informal and no record, or at least no formal record, is kept other than perhaps teacher notes in the student folder. However, many times the teachers fill in with the student the formal four section report, and they do complete the preliminary copy. This can be done once a week, for example, if desirable. It can also be routed to the counselor and parent. However, from a practical view, this informal report is usually filled in for only the first three sections and not sent to the counselor, office, and home, except for the preliminary report, and is usually done on a less expensive dittoed form, rather than the more expensive carbonized edition.

It has been determined that it seems best to set some formal time for evaluations (the once each traditional quarter approach) rather than let the evaluations happen whenever the student and teacher feel that it is the best time. Several teachers usually fail to communicate often enough if left on their own.

Therefore, the two, three, or four formal evaluations on specific dates insure that appraisals are completed; however, the informal "do it when it seems best" philosophy is also maintained by providing for other evaluations to take place as needed, and by arranging for these to be very informal, semi-formal, or complete circuit carbonized type of formal reports, depending upon the perceptions of the student and consultant. In the completely open "free" school, these formal reports are not necessary, and certainly not at a specific date or certain periods of time. Schools which can escape the formality should certainly be encouraged to follow the informal or "no report" approach, but at this moment in time, most schools still believe they need some reporting structure; the system described here is one alternative among many.

Parent conferences are still used as a supplement. If the parents desire to know more, they may make an appointment with a teacher, the advisor, or a team of teachers, or most any combination of school and student personnel which may seem desirable. The school administration or an individual teacher working through the advisor may likewise initiate the request for a conference with the home, either at school or in the home, with or without the student, depending upon the circumstances.

In no case in appraising and reporting student progress are A, B, C or percentage or numerical type grades used, nor is any grade point average, class rank, or other comparative analysis made. As a student progresses through work in math, for example, the teacher may suggest a 10 question "test" over the work. The teacher may even mark 4 correct, but hopefully not 6 wrong. The consultant and student then sit down to analyze why the 4 were correct and the 6 wrong. If the 6 wrong are important, the student receives help on how to overcome the deficiency. The student does not fail in terms of an "F" grade, but the student may have "failed" at that moment to reach the goals set and/or obligations contracted, though "contracts" are not the recommended method except in certain instances. The student may need to review the work again or have new goals set; the effort is to have the individual work at it until it is learned or until it is determined that the additional effort is not of that much value--the purpose of evaluation is not to determine grades for report cards.

Students sometimes ask for an analysis of how they are doing compared to others. Typing is an easy illustration. The teacher may say that the approximate mean of students who type at this school is 45 words a minute with two errors. The student can then check to see how his or her skill in typing is progressing as compared with other students who type.

Informal conferences, from which plans develop that seem important enough to record, or information helpful in further discussions can be jotted down in the "subject" or team file; parent comments can go directly to one teacher, a team, the advisor, or eventually to the administration--depending upon the content and value of the comments as related to the individual and/or the general school program, but the advisor is kept informed of all pertinent information. Parent conference summaries can receive the same type of followup.

For students in what used to be the traditional K-8 years, there is no concern over "passing" or "credits"; schools should just be continuous progress opportunities. "Courses" taken are recorded on the Experience Record kept in the permanent file for that purpose, along with other records such as test scores and subjective evaluations. Other records are kept in the team folders and the advisor folders. For the subjective Advisor Evaluation, the same process is followed except a short

yearly written summary statement is made by each advisor for the permanent office record so that there is a composite profile for each student by the time he graduates. This summary should indicate the individual's growth and development in the affective, psychomotor, and cognitive domains, and the perceived potential for future learning opportunities.

The advisor who has the student during the traditional junior year pulls together a three year summary of the high school years, so that students applying for college admittance in the fall of their "senior" year, or for early graduation, or for jobs have a profile to submit. This needs to be done again at the end of the senior year. The profile is not as complicated as it may seem. For high school students during the first year, a short separate summary of the student's progress is spelled out. Another short summary is made the second year. The information of the third year is combined with the two previous years so that one sheet is still a composite profile. Then the fourth year, the additional information needs to be added to the previous three year picture; thus a composite of the individual is easily available as each advisor only has a few to write.

Each year a list of the experiences that a student has taken is recorded in the student's planning center (office) folder. These are listed under each subject, interdisciplinary team, or other such arrangement, but as suggested earlier, the easiest way now to satisfy the colleges is to list each of the experiences under a traditional subject column. Each time a student completes a "course" or "experience," whether the person spent 4 weeks, 14 weeks, or 40 weeks studying the subject in depth or only giving it a surface coverage, it is listed under the most appropriate column; completion is based upon meeting the responsibilities and work agreed to with the instructor. In this manner, a student may have under Industrial Arts long lists of courses in that area, and also under Art and Home Economics, but may have a blank under Spanish. This easily shows anyone the interest and involvement of each student.

A college, for example, would receive two items: (1) a summary Advisor Evaluation, the one page subjective opinion statement of the student as seen by the teachers and advisor including the probability of success in future school work, and (2) a list of the experiences pursued during the four years (the Experience Record), including a section for standardized test scores; student activities are listed under the most appropriate subject column. These pages of information would replace the discriminatory G.P.A., class rank, and A, B, C syndrome. In addition, the college would be requested to send for any other specific information they needed, depending upon the individual college. The same kind of information would and/or could be sent to prospective employers, vocational schools, interest schools, or any other "beyond high school" use the student might need. This would serve as the student's "placement file" until he or she established one through further work or school experiences.

For a student in the traditional pre-high school years, he or she will have subjective evaluations in the subject folder and in the advisor folder--the Experience Record, and the Quarterly Records--the same as the high school student. The only difference is that in the last four years the yearly summary is prepared more carefully in terms of college or employer criteria.

If a student should transfer in the pre-high school years, his Experience Record list is completed and the Advisor Evaluation is prepared. If the student is going to an open concept, nongraded school, that is all that is needed. However, if transferring to a traditional school, a "grade placement" recommendation is sent

to that school, as determined by the advisor, or in consultation with other teachers, if it is not for the "normal" yearly growth promotion to the next traditional grade level.

The flexible high school will generally be satisfied with the above type report as is the flexible college. However, there are many rigid schools who are all upset if standard information is not received. Open schools should refuse to send grades, class rank, and other, but if essential, should fill out a standard transcript for the individual. In other words, in order to help the student in an emergency, the school interprets and transcribes the transcript so that a mini course in Zen, a midi course in astrology, and a midi course in humanities may be converted into English II, worth 1 credit. This way the person who is forced to transfer at the end of the "junior" year to a traditional school can have a transcript prepared that shows traditional credits in English, social studies, math, and other requirements, but only if absolutely necessary. We know there are no magic requirements for all students, but for the school that still pretends that there are, play the same game and make out a transcript to help the student. This transcript can be prepared by the school counselor and a school administrator with any help from teachers that may be desired.

Rarely is this needed for colleges, but it can be done, again to help the student. The same applies to eligibility rules, scholarships, and other. All students enrolled are eligible; thus the forms are filled out accordingly. The same can be applied to the horrid practice of signing insurance forms to set insurance rates which is not the business of the school. When a scholarship is involved, schools can create a class rank that is a subjectively accurate evaluation and amounts to the same placement as one devised by any percentage system. It is done by a composite of subjective teacher evaluation at the time it is needed. Seldom will a G.P.A. be essential, but it can be arrived at through test scores and subjective ratings of teachers. In other words, the student is protected if he continues work in a flexible organization which is really concerned about the individual. If he moves to a rigid, content oriented program, make compromises if necessary and fill out the appropriate forms. Let it be clearly understood that the school should not prepare a dishonest transcript. In other words, if a student has taken absolutely no math or nothing in any way related to math, the school should not create one credit in math. If a student has taken only two years of English and is rather weak in that area, the school should not create two more credits in English. However, if a student has taken three years of English and does well in it, grant a fourth year of credit if the student desires to broaden his or her background in another area; or if a student takes a heavy concentration of art and music, much of the reading and writing for those fields can be translated into an English credit, the same as can humanities and other similar courses.

In Chapter 15 the "safe regulations" as spelled out by many states and colleges were listed. These are usually wrong and therefore should not be forced as requirements. However, though a balanced diet is recommended--some art, some home economics, some English, some of everything--the parents and students must assume the final responsibility for the selection of courses. The school should counsel, but not require or make the decision. If a student lacks a course in English for admission to a certain college, he must bear the consequences of his choice. Because most state colleges still have open admission policies, he can go to college, but he may not get into some "special" college with very specific requirements without first taking additional work.

Schools have tried to make out lengthy behavioral objective evaluations showing exactly what the student has accomplished in each area. Three things were wrong: (1) the folder became so bulky that even though excellent information, the colleges did not want such a volume; (2) it took hours of clerical time for the teachers; and (3) most important, standardized behavioral objectives could not be prepared ahead of time, such as skills in math, and then checked off as the student completed them. This works in a group required program, but where an individual program is really followed, it means individual behavioral objectives for each student in every undertaking, and at present this did not seem feasible nor necessarily desirable.

The above descriptions are still analogous to the P-38. This is not a jet way of appraising and reporting student progress. Most schools are still trying to move into the jet era. And like the P-38, which was merely a stop-gap measure, this type of reporting system may prove to be the same. It seems to be working well now, as the P-38 worked well for two years, but soon we should be able to discard the P-38 for at least an early stage jet. Some schools may find it necessary to continue to fly the P-38 until others develop a new method that they can agree to and afford to buy. If a school works only on one change, namely, reporting student progress, it is much easier to develop a jet form; but if the school is small and is working on massive changes, then sometimes the staff must be content temporarily with the P-38 in some areas.

Attached are examples of the kinds of forms that can be used; following these forms are suggestions for other alternatives that are available--a P-51 model instead of a P-38. In spite of the deficiencies in their present reporting systems, open schools would never return to A, B, C, class rank, G.P.A., credit kinds of forms. The solution is eventually to develop a new model, not go back to the old. Certainly though, some of the information formerly recorded on the traditional transcripts is of value and should be included where appropriate. Included on the next few pages are samples of three evaluation forms which when used as a package form a complete temporary and permanent record system for the student, parent, school, advisor, college, and employer.

The Progress Report is the summary of student progress as described in this chapter. The Advisor Evaluation is the cumulative summary written by the advisor each year. The Experience Record is the temporary method used to list "course titles" completed in the various areas and includes activities and test results. The completion of an experience is determined by the goals set and agreements reached between the student and instructor or team, and as recorded on the Progress Report.

The Progress Report does not go to the college or transfer school, but the Experience Record and Advisor Evaluation are sent to colleges, transfer schools, employers, or other interested and qualified parties, upon request of the student. They form a tentative placement file for the individual.

The fourth sample, the Subjective Conversion Process, is a method for determining G.P.A.'s and class rank in the extremely few times it may be absolutely essential. It includes the procedures, the possible need, and the rationale behind such an effort.

PROGRESS REPORT

Name of Student _____ Subject/Team Center _____
(Last Name) (First Name)
Advisor _____ F W Sp Su _____ Instructor(s) _____
(Year)
A. Goals set by student and teacher. _____ Date _____

B. Adjustment/accomplishments toward goals as viewed by _____ Date _____
student and teacher.

C. Additional comments by teacher.

D. Advisor comments.

E. Disposition of the experience:	Completed	Continuing	Discontinued
Experience Titles 1. _____	_____	_____	_____
2. _____	_____	_____	_____
3. _____	_____	_____	_____

Comments _____

NOTE TO PARENTS: If you wish to hold a conference with the above-named instructor(s) regarding this report, please call the school and make your request. If you prefer, you may wish to respond with a written statement.

ADVISOR EVALUATION
Cumulative Yearly Summary
Date _____
(*Note--Use reproducible pen,
pencil, or typewriter)

Student's Name

Advisor's Name

This is a subjective evaluation made by a teacher with whom the student has counseled during the past year. It is cumulative in that it includes a summary of previous evaluations of advisors, and it represents our best knowledge as to the development of the student as of the current date.

- (1) Growth and Development in the Affective Domain: (Examples: self-image, responsibility, self-direction, motivation, creativity, person relationships, critical thinking.)

- (2) Growth and Development in the Psychomotor Domain: (Examples: physical maturity, handicaps, fine and gross motor coordination and skills, strength, athletic ability.)

- (3) Progress and Achievement in the Cognitive Domain: (Examples: knowledge, interest, skill in subject areas--art, English, home, ec., math.)

- (4) Observations Regarding Future Interests and Goals: (Examples: work, vocational school, fine arts school, large university, small college, financial factors, marriage.)

NAME _____

Instructions: List experience and year completed

Example: Painting - 71

Date sent _____

Art	Business	English/Theater Arts	Foreign Language	Home Ec.	Industrial Arts

Mathematics	Music	Physical Ed./Health	Science	Social Studies	Other
Test Results					

Subjective Conversion Process

Hopefully schools will not have a need for this conversion process, but occasionally outside forces such as a special college or a scholarship request demands a G.P.A. or class rank. If one is ever needed, it can be obtained in the following manner: (1) The school counselor interviews those instructors who know the student and receives a subjective rating as to what traditional mark (A,B,C) the student would probably have earned in that subject field, as judged by the instructor. Both current and past instructors who may still be in school and who know the student will be interviewed. (2) The school counselor may get subjective estimates from teachers and the student's advisor as to a "guesstimate" G.P.A. and class rank. (3) The school counselor can look through the student's files and the Progress Reports. (4) The ITED, SAT and other test results may be studied. (5) The counselor is sometimes aided by other records such as those received for transfer students. (6) The counselor should interview the student regarding the student's own self-analysis. (7) From the above six sources, the counselor can reach a determination as to a G.P.A. and class rank.

The above procedures will seldom be necessary for the students under the following conditions: (1) the student who does not attend college; (2) the student who goes to an open enrollment college, junior college, vocational school, or fine arts school; (3) the student who goes to a smaller liberal arts school which relies heavily on entrance examinations; (4) the student who attends a more flexible, open concept college. Thus only a few individual circumstances will demand the traditional rankings.

When open concept school graduates do run into G.P.A. and class rank difficulties, there are three things that can be done: (1) Parents and/or the school can go to court and battle the system; (2) the student may alter his plans--go to another college, try for another scholarship, apply for another job--remember the family accepted some risks by attending an open concept school; (3) take the easier way out by allowing the school to determine a G.P.A. and class rank.

G.P.A.'s and class rank figured as above are not false, as all such evaluations which claim to be objective are based on subjective opinions. For example, when the English student is given a B on a theme, the instructor has given a subjective grade. When the history professor gives 100 "objective questions," his selection of the 100 is subjective; so is his decision to make 92 an A and 91 a B. The traditional school claims it has an objective analysis because it gave numbers to subjective decisions. All the open school is doing is creating "objective" G.P.A.'s by determining them after the completion of the experiences rather than at the time of the specific grading period by going back and interviewing, studying reports, and evaluating tests. Though it is realized that colleges see these numbers as an indication of ability to do college work, not all students attend college; in the open concept programs, these rankings are as destructive as separating by race, religion, or economic factors; therefore, seldom will these be necessary. The combination of the student's Experience Record and Advisor Evaluation should provide the kind of information which will enable colleges and/or employers to make intelligent decisions regarding that student's chances for success. The admissions director or employer who feels that he cannot make a judgment based upon these records should write to the school for additional personal information.

Other Alternatives

There are, of course, many other methods for appraising and reporting student progress. The main point is to eliminate the A, B, C, class rank syndrome. For those not preferring the approach and forms just described, presented now are steps which can be taken which are alternatives of the previous plan. These are more moderate in their approach and provide for a more gradual transition. Much of what is presented is repetition, but it does allow for a different path to eventually achieving the same goals. It is based more on the parent conference approach and offers guidelines in this direction.

(1) In preparing for appraising and reporting student progress through parent conferences, teaching teams should meet to plan for the conferences, to decide on formats of report forms to be given to the individual student advisors, and to discuss the format and the method of scheduling the individual conferences.

(2) Each teacher should individually evaluate each child in much more detail than when completing the old report cards. They should try to diagnose and prescribe. They should say, "This is where he was when he came to me in September, this is where he is now, this is where he seems to be headed"; then the next question to ask, based on the strengths and weaknesses of the individual, "Does the progress seem to match the student's interests, needs, and abilities?" The adults should identify the prescription being used for each child to maximize his strengths and overcome his weaknesses. They should try to know the student as well as they know themselves.

(3) Each teacher should then have an individual conference with each student to discuss his or her progress to date, and to suggest future directions. The student should have an opportunity to discuss with the instructor his or her feelings toward the success he or she has had during the school year. Take time for many of these short individual conferences with students--in the long run they are superior to large group classes.

(4) Record the information about each child on the evaluation form which is being used for each class, or subject, or team. Staffs should not be interested in above average, average, and below average ratings, but instead should be concerned about individual progress. Each check sheet should identify skills and concepts being pursued by the individual learner. These can be combinations of behavioral objectives, check lists of skills, chapter content, completed projects, or other, depending upon what has been accomplished in curriculum and individualization to date. They can primarily be written teacher comments, but they must be specific enough to indicate that this seems to be the diagnosis for the particular child, and this seems to be the appropriate prescription. For example, the patient has appendicitis is the diagnosis--the prescription, surgery next week.

(5) The team should then meet to make sure each advisor understands the forms or check sheets used by various teachers in the team. Individual records for each student from each of the subject areas or various consultants are given to the advisor to review in detail. Every student should have several folders in school. One should be his permanent folder which is kept in the Planning Center; another should be a yearly progress folder which is kept by the advisor as a record of achievement and growth during the year in all areas. Others should be kept by each individual teacher for each child in the particular subject area. For example, each student should have a math, English, and art folder, or one in the creative,

expressive, and system centers, if interrelated, as well as the yearly progress folder, and the permanent one.

(6) After the advisor has reviewed each of the folders for his or her individual counselees, the advisors of each team should meet as a group about those whom they are most perplexed at present; however, over the year, every student ought to be carefully considered by the team. This type of team approach will enable teachers to ultimately know students much better than was ever possible under the "my student and my classroom" approach.

(7) The advisor then can prepare for conferences with the parents, and can prepare reports for other teachers, schools, and colleges. The advisor can comment on all courses taken by the student as well as provide a summary of the knowledge possessed about problems and growth in the cognitive, affective, and psychomotor domains. The advisor may or may not want to have the student as well as the parent attend parent conferences. The form of the conferences can be individualized to suit each teacher, and whether individual teachers are scheduled out part of each day, or whether parts of the school are closed for half days or several days, or whether meetings are held in the evenings for some with compensatory time for teachers for the night conferences is not terribly important. Whatever manner members of the teams feel that they as a team, and as individual teachers can be most effective should be the criterion; the evaluation approaches should be arranged to fit their patterns. Generally, conferences for half a day seem to be effective for most people. If each of the advisors have 12 to 20 advisees, they should decide whether they want 15, 20, or 30 minute conferences, depending upon the need. The length of written reports can be varied in the same manner.

(8) When conducting parent conferences, if a parent is satisfied with the conference, fine. If the parent is satisfied with all but one report and wants to see that individual teacher, an additional conference can be scheduled. If the parent is completely dissatisfied and wants to see all of the teachers, the school should attempt to set up a team conference at the school's convenience.

(9) By the end of the first year, these evaluations should be quite sophisticated. Over the years, they will continue to improve; all these steps may not be possible on the first attempt, but each teacher and each advisor must do their very best to know each individual as thoroughly as possible; the teacher-advisors must be able to report on a diagnosis-prescription basis the progress of each child to each parent. Remember the students have chosen the teacher-counselor in most cases as one they can relate to and one in whom they have confidence. Each advisor who feels that perhaps he or she does not know a particular advisee as well as necessary, must be sure to have more individual conferences with that student soon. This system makes each teacher a counselor-consultant-advisor. Schools can then use their trained counselors in true counseling roles, and not as glorified clerks, as many now are forced to operate.

One method for scheduling conferences is for schools to plan on two parent conferences a year--one in the fall and one in the spring. In addition, one or more of the teams may decide they desire a third or fourth conference, and individual advisors or individual teachers may schedule conferences whenever they desire or as needed. The types and numbers of reports sent to other institutions may also be varied. As another alternative to formally scheduling "you come" conferences, parents can be given two to four "blank checks" for the year, and whenever they want a conference, they cash a blank check. They send in the request for information to the school; a check list response showing the amount of success

toward experience completion and to what degree of satisfaction can easily be gathered and mailed home. If the parents are satisfied, no personal conference is necessary. If they want more information, they can call for a session with the advisor and/or teachers.

(10) The teams should agree in general as to the forms that are used, but each teacher should individualize the report according to the objectives sought. In other words, individual teachers may create their own report forms, but the team should be in agreement as to the general type of report to be used, so that inter-precation by all concerned may be facilitated. The individual student folders as compiled by the advisors are passed on to next year's counselor, with any pertinent permanent information recorded in the individual's file in the office. This information can be forwarded in the case of transfer or graduation.

High school teachers may use individual forms for conferences as agreed to generally by the team, but individualized for teachers and subjects. However, the high school staff must also reach agreement as to a written form that can be sent on to colleges and employers. Schools should attempt to reach agreement with colleges which serve their constituents as to the format acceptable to both the high school and college as a method of evaluating students. While negotiations are underway with traditional colleges the first year, separate lists with A, B, C marks can be recorded on forms to be used in case one of the students applies to an obsolete college that will accept nothing except grade point averages. The school can go back and figure up a G.P.A. for that student, as schools should not deny any individual the opportunity to apply to any college he desires. Though the college is wrong in requiring grade point averages and grades, high schools are the ones who must be flexible enough in the present stage of development to provide whatever the students need to get into college. Hopefully most of them will accept the proposed forms. Schools have found that the better colleges are most willing to work with schools and accept the students without the usual rituals. The true open schools do not give any grades of any kind or keep a separate file of ABC's. The philosophy says no group comparison report cards, so none are given. All students who desire always get into a college.

In addition to the achievement evaluation, there can be a separate attached form filled out by the counselor which would cover student activities and other information of value for the colleges. The schools can include cover letters explaining the nature of their programs and ask for college cooperation in accepting students in these pilot efforts. High school teachers should try to make their evaluations meaningful to the colleges and tell them more than was ever possible with the A, B, C type of report.

Depending upon the forms being used, if a student were taking seven courses, for example, the college may receive a report for each subject as prepared by the teachers of that subject on a cumulative basis, plus one summary sheet on activities and other objectives. Thus a college might receive eight statements about the student, although four smaller composite pages go better with the college admissions offices. The size of these forms should be determined by the team; a start is needed in each school, and even though all usually need revision after the first effort, they can be used nationally to get the movement started. Ultimately, much of this type of reporting can be somewhat formalized, but the first attempts at evaluation should be by hand, and individualized for students and school programs as much as possible.

One thing to remember is that no student should get a D or F grade or the equivalent. In other words, a student does not pass or fail--either he completes the

course to the satisfaction of both the student and the teacher, and thus one of these forms is filled out for him, indicating completion, or he just has no record at all, indicating he never took the course, or at least never completed it. If a student is having difficulty in a course he is pursuing, then it must be determined whether or not the course and objectives are right for that student or whether they should be modified. Generally speaking, if a student is doing poor work, it is the fault of the school by having the student in the wrong requirement, or having failed to personalize the program, or having provided the wrong prescription. When we are sure it is the student's fault, and this is sometimes true with students who have problems in the area of the affective domain, we ought to do everything we can to overcome the difficulty the student is having so that he can pursue work that is meaningful to him. Usually advancement in the cognitive area will occur when the hang-ups in the affective and psychomotor domains are cured.

If a school is in a community where some parents are just extra hard-core about report cards, there is a way to solve the situation. DEVELOP THE CONCEPT OF OPTIONAL REPORT CARDS. Why should those who don't want them be forced to receive them because of a group of resisters. Have a parent meeting one night; the administrator can preach no report cards, followed by a panel of teachers and parents who also sell the no report card system. During the question session which follows, almost always there are a few who insist on having a report card. At that moment, when the going gets rough, say, "If there are still some of you who want report cards, even though the school doesn't advise them, leave the name of the student and parent in the box at the back of the room"; the school can then compile a list of those students and tell teachers if they have one of them, mark their papers with red pencil, keep grades, and every nine weeks send home a report. For those who do not put their name in the box, prepare oral conferences or other type written reports. This optional method generally works beautifully. Use the same concept on hall passes, attendance slips, and other. The best schools don't have any; no student has to bring a note from home or carry a pass, but if some parents insist, let them send a note.

Hopefully some of these ideas will help more schools eliminate report cards and passes. One day in the near future they will be a thing of the past. In the meantime, a few pioneers must explore the possibilities. Schools which have abandoned the report card system realize the relaxed, less pressured atmosphere, and are convinced that both the affective and cognitive domains will in the long run greatly improve.

Chapter 17

Year Round Schools

The year round school is coming; the lighted community school is coming; the school in the community is coming. These three concepts cannot be denied during the 70's. Common sense indicates those directions are essential, and economics, technology, environmental concerns, and the need for human and physical resources will overcome all the traditional arguments against their implementation.

In the long haul these concepts will save money and provide for human resources to a greater potential than ever before. Schools open seven days a week and late into the night--all night in some communities--will provide meeting places, learning opportunities, exercise and leisure time pursuits. When the school moves into the community--into the art centers, the businesses, the industries, the music halls, the parks--the conventional school house can be reduced in size or can accommodate a heavier load than present--for students will be out in the community for much of their week; additionally, as technology increases, more learning will occur at home through computers, retrieval systems, and quiet independent study.

Books could be written on the lighted school and the school in the community concepts, as well as the year round school, but rather than describe any of these in detail, this chapter will attempt only to highlight the advantages of the year round school as an introduction to the exciting breakthroughs that will descend upon education in the decade of the 70's. Only a few school districts have had experience with the year round school, and many of them have only been in operation a year or two. But the notion is not new and much thinking has gone into the planning stages. Presently there does not seem to be a best way. Thus educators should look at the efforts throughout the nation where individual schools, school districts, or state departments have made major studies or have piloted these efforts; from there it is up to each school district staff to glean ideas that would work in developing a year round school in their community.

Those who have worked in twelve month schools have uncovered some amazing "little" differences that are beginning to pay off. Continuous progress year round schools, for example, have discovered that the stock market peaks and depressions begin to disappear as a group syndrome. In nine month schools, administrators can fairly accurately predict that in early November and late February, faculty morale will hit bottom. In November the staff is too far away from the start of school to be fresh from the summer; there are problems in their classes or with school policies, and Christmas vacation and June seem like years away. In February the winter weather coupled with midyear fatigue and no vacation in sight until Easter causes another let down.

In a continuous twelve month program, teachers' vacations are staggered. They are not all hired at the same time, do not take three month summer vacations at the same time; they still hit the same individual ups and downs, but the school as a whole remains more on an even keel. Further, there is not the frustration of retraining a whole group of new teachers in the fall, or signing out an entire group in the summer. Nor is there the problem with students having the same up and down and starting and stopping and registration peaks, with the famous three weeks of drop-add. Students coming and going as individuals prevents the calamity

of mass exodus and entrance, and saves many hours of wasted time getting started each fall and closing each spring.

However, most school districts have failed to truly explore the advantages; they have gotten cold feet when they tried to study the issues and then ran into conversion problems related to money, community attitudes, bussing, vacations, course scheduling, and all the rest. This chapter is not going to explain how to handle these mechanical details, but rest assured they can be solved. Rather, the focus is going to be on the humaneness concept of a year round school; if there were no other advantages, that one word should be enough to force implementation. Fortunately the other advantages are there too. Much of what will appear in the following paragraphs was first published in the August/September, 1970. issue of the Instructor magazine. More detail is added here, but the general comments are the same. Further, some repetition will appear from other chapters, but it reoccurs here as a further illustration of how all the 69 changes listed in the glossary must be interwoven if innovation and revision in schools is to be successfully accomplished.

As the title of this book denotes, humaneness is the relevant word in education today. ASCD's yearbook, To Nurture Humaneness, keynotes the emphasis for the schools of the 70's. The affective domain is more important than the cognitive, though both interlock and help each other. In developing a humane school, one of the most important concepts is that of the year round school. Remember, though, that while the school is open for learning opportunities twelve months of the year, closing perhaps for only a two week winter vacation break, one week in the spring, one in the summer, and one in the fall to provide a little group retooling time--thus students could attend almost every day of the year--forced twelve month schooling is not advocated here. Rather students should attend school during the twelve month period when it is most appropriate to individual and family needs. Thus a student could take the summer off as in the past, or go all twelve months; it is anticipated that among the faculty and students, some will always be on vacation, in the community through relevancy projects perhaps sponsored by or with the school, or taking a day off.

From an economic point of view, 'ne year round school makes sense. We can no longer tolerate use of school buildings one-fourth of each day, one-half of the days of the year, and three-fourths of the months of the year. We buy portable classrooms and adopt split shifts in some districts, yet the schoolhouse sits empty the major portion of the hours of the year.

Beyond the economic factors is the realization that year round education provides for students and teachers learning opportunities never before available on a constant, immediate basis. No longer is the student restricted to learning from 8:30 to 3:00, from September to June.

But even more than economics and opportunities is the notion that if education is ever to reach a professional status, in an environment where humaneness dominates the theme of education, then schools must remain open all year round. For years we have preached concern for individual needs, interests, abilities, and differences. We claim we have these cliches as basic goals--centered around empathy, concern, relevancy for the individual; yet in school after school, college after college, year after year, all over the country, students are required to be in school from September to June to sit in group-prescribed, group-paced instruction.

Group diagnosis (all seventh graders need math), group prescription (all seventh graders must take math), hall passes, study halls to enforce rigid regimentation--

the typical procedures by which most schools still operate today--will be the death knell of what we now call free, required public education. Perhaps it is best that the present nine month American school system decays; it could not be much worse; further decay may be a blessing in disguise by finally forcing the sadly needed rejuvenation of education.

The three advantages of the year round school mentioned thus far, those of economics, continuous self-paced learning opportunities provided to both students and teachers, and humane considerations are real. As just one small example of the humane aspect, look at the problem of the carpenter. In Minnesota the January temperature sometimes reaches a minus 30 to 40 degrees; the snow often is piled high. It is rather difficult for the carpenter to build houses in these conditions. He must work six or seven days a week during the summer to construct Minnesota's buildings and to earn a living for his family, for he is slowed or idled in his profession during the worst periods of construction weather.

But can he take a family vacation in January? Can he go swimming in February in Puerto Rico or in some other place that many might choose? The response, of course, if he is a family man, is a big NO. Why? The answer is obvious: the ritual of the public school, not based upon any research or any consideration of humaneness for the individual, says that the children of the family cannot miss January and/or February. The child must be in school. He cannot miss those magic months; he cannot miss the lectures, the homework, and the think-and-do books. Under great stress, the child and family face conflict and punishment if school is skipped. The children must flunk, or be retained a grade, or not be able to "catch up." Why don't educators in Florida let their families take vacation in January so some can go North for snowmobiling, skiing, and ice fishing?

All of these obsolete superstitions are based upon traditions and convenience. Students are the pawns of administrators, teachers, and board members who look for the easy way out. Johnny cannot miss school because of the group-paced requirements and group-paced instruction. Yes, some students are absent because of illness, and we overlook some of their "missed work"; but look at the pressure put upon the child to "catch up" so that they can regurgitate cognitive answers on final exams at the same time the other students take them.

What research, what evidence do we have that Pete and Sally cannot learn in July and August? Why not let the family vacation in January? It is not only the carpenter. What about the railroad worker low on seniority who receives a January vacation, or the school superintendent who can best take a vacation and who should change jobs in a nine month system in January, or November, not in July? Limited summer school programs, whether enrichment or remedial, are not the answer. Forced quarter plans are not the answer either, though they are much better than the September-to-June syndrome. If schools truly operate on a personalized program, individualized instruction, and continuous progress philosophy, the year round environment becomes a realistic, practical, humane concept which most school districts can undertake immediately. Nuts and bolts details as to teacher contracts, student enrollments, staggering vacations, cleaning buildings, and all the other minutiae, though important and realistic considerations, can be overcome by committed school boards and educators.

Some schools in 1970 are really serious when they say they believe that schools must truly be significantly different if they are not only going to survive, but if they are really to be significantly better. Staffs are becoming determined to develop a humane school. The year round concept is only one of the many

necessary changes, but without adopting it, much of the humaneness philosophy could not be implemented. On the other hand, some of the other revisions are essential too; otherwise the ritual of closing schools in summer, or continuing to hold separate summer sessions would be hard to break. Worthwhile changes are interwoven to the point that they affect many aspects of the learning environment.

For example, one of the humane approaches that interweaves with the year round school has been to let students choose their own teachers, but the six factors mentioned earlier in this book do relate to the mechanics of matching vacation periods--personality (the student and teacher must relate); perception (the student and teacher must perceive similar goals and relationships); age (some students do better with the young swinger in the short skirt--others with grandma); sex (some are better with male teachers, some with female); interest (common topics of concern); skill (the teacher/student abilities must match). The opportunity for students to choose their own counselor, who is also a regular teacher--an adult to talk to--further complicates the system. Each teacher is concerned with a few students who choose that adult, but if their vacations do not jive, and rarely do they, then temporary advisors must be arranged; thus the mechanical organization of blending teacher and student vacation periods does affect the development of year round education.

Students developing their own curricula as much as possible, including those anticipating completion of the traditional senior year in 1984--also complicates the mechanical process. But if relevancy is the key, and twenty-five years of research validates the notion that students learn best those things which are relevant and meaningful at this moment in time, and if individualized instruction, independent study, and small group mini-courses are factors, then these are realities which must be considered in planning and implementing a year round school. Further, concepts such as "with freedom goes responsibility and courtesy," optional attendance, self-direction, decision making, open campus, and individual choice are all part of a humane year round school, but they again complicate the process of organization.

Mechanically, nongraded schools built around interrelated team centers, consultants working as members of cross-discipline teams, home economics, art, industrial arts, physical education, and other former "second class citizens" being treated equally with English and social studies, individual evaluation, no report cards, class rank, grade point averages, emphasis on the affective first, the psychomotor second, and the cognitive last, all have an impact on the arrangements for the year round school, as does the belief that learning how to learn, and learning that learning is fun are more important than the so-called "basic skills."

Further, producing daily smorgasbord schedules, thus building over 240 in the year round school instead of one master schedule as most high schools build each year or instead of one assignment to the self-contained elementary room or instead of one computer development of the inflexible flexible modular flexible schedule which provides five patterns of one schedule; writing and converting to individualized materials; remodeling traditional rooms; improving the physical environment with carpets, plants, animals, and bright colors; decentralizing the decision making process with new roles for administrators, faculty, parent, and student groups; developing a lighted community school; revolutionizing teacher education programs--these ideas all affect the year round school concept. The mechanics of being open twelve months is not enough. The entire program--the philosophy, the curricula, the learning methods, the organization, the facilities, and the evaluation procedures--must be dramatically, rapidly, massively revised.

There are many year round efforts now under way. Before deciding which direction to take, the school or district (hopefully soon most all districts in North America) planning a year round school should investigate many of them. For example, as of 1970, the Atlanta and Fulton County, Georgia, schools have adopted a quarter plan for the secondary students where the individual may choose to attend three of the four quarters. Jefferson County Schools, Louisville, Kentucky, have adopted a year round school concept for K-12. The 45-15 plan in Valley View District in Lockport, Illinois, is an imaginative way to solve space problems. The State Department of New York has been a leader in developing alternative plans for implementing year round programs. Pennsylvania is now pushing the year round school, as evidenced by the Second Annual Seminar on Year Round Education held in Harrisburg in April, 1970.

A number of other states and school districts are heavily involved in studying the year round school. In Michigan, for example, several communities such as Northville and Utica have made exhaustive studies of the feasibility and advantages of extended year schools. Many writers are advocating the year round school, and thus articles and booklets are becoming available. Probably the most prolific summary of the entire present movement on year round schools, as of 1970, has been compiled by the Utica, Michigan School District (see Glinke, Bibliography).

A recent publication titled The Year-Round School, produced by the Association of School Administrators, points to the platform adopted by that organization which calls for "extended use of all school facilities for educational and recreational purposes." It also includes a quotation from a 1966 address given by President Johnson:

Tomorrow's school will be a school without walls--a school built of doors which open to the entire community.

Tomorrow's school will reach out to the places that enrich the human spirit--to the museums, the theaters, the art galleries, to the parks and rivers and mountains.

It will ally itself with the city, its busy streets and factories, its assembly lines and laboratories--so that the world of work does not seem an alien place for the student.

Tomorrow's school will be the center of community life, for grownups as well as children--"a shopping center of human services." It might have a community health clinic or a public library, a theater and recreation facilities.

It will provide formal education for all citizens--and it will not close its doors any more at three o'clock. IT WILL EMPLOY ITS BUILDINGS ROUND THE CLOCK AND ITS TEACHERS ROUND THE YEAR.

While all the many studies and plans for year round education that have been developed have much to offer, and for some school districts there is no doubt that the multiple trials, or quarters, or 45-15 systems fit best at this moment in time because of mechanical situations such as enrollments, finances, and facilities, in the next ten years there will be a decided trend toward the year round continuous progress program now under way. The ability to come and go at any time as needs dictate throughout the year is a tremendous advantage that far outweighs quarter or other plans.

But further, more leaders are becoming committed to the notion that all 69 concepts listed in the glossary must be implemented for a district to truly develop not just a mechanical year round school, but rather a humane year round approach. These educators are excited about the prospects of what can ultimately be done to further expand and improve the quality of the programs described above. Most important is that the twelve month pioneers will never be forced to turn back the clock to the obsolete September to June formula, but instead can continue the search for truly better, relevant, meaningful year round personalized, individualized approaches for all students.

Reforming College Education

Probably the most unanimous agreement that could be reached in 1970 among the nation's public school teachers, undergraduate and graduate students, and other past college enrollees is that the educational institutions most resistant to change, and the ones most in need of revision are the colleges and universities of the United States. Obviously there would be those who disagree, and most unfortunately, those who are the most vocal and most politically resistant are the faculty members of the institutions who hold the majority of the seats in the faculty senate and important committees.

Coupled with timid administrations, or administrations entangled with the various external and internal pressures, law and regulations, and the fact that there are no alternatives for the student (especially those without money), the colleges sit tight. They know that if an individual wants a doctorate, that person must have their college signed union card; therefore, if the student doesn't like the way things are run, the choice is to quit. No one is forced to attend college. If on a grant-in-aid, the student dare not protest too strongly for fear of losing financial support.

Add to these factors the student unrest over Vietnam, the minority studies demands, the drug problem, bombings on college campuses, strikes and demonstrations, shootings by National Guard troops and police, and presidential commissions on campus unrest; it is easy to see why significant change in the organization and curriculum of these institutions has been massively stalled. On the other hand, it is interesting to speculate how much longer student protest will center on Vietnam, the society in general, and "minority" recognition rather than the requirements and methods of teaching. In 1970, a common practice is to allow no more than three absences without an M.D.'s signature. No wonder a revolt is on the horizon.

The suspicion is great that unrest will soon turn to the learning programs. Chances are that demands to have input on the hiring and firing of professors, the right to evaluate professors, the right to have a hand in the selection of the administration, the right to help determine a relevant curricula, and the insistence on a thorough review of all college requirements and policies will be paramount in the next round of student protest; already dormitory living regulations, hours, dress codes, car policies, drop-add procedures, and grading systems have come under attack and have been modified. These have been only small beginnings. The explosion is yet to come; and what will be a shocking surprise to many is that if the unrest is in the form of peaceful dissent and involvement in discussions, committees, and meetings, and if the demonstrations go no further than for the entire student body to walk across the street and sit on the curb, the students will be supported by a growing number of educators and parents. The irrelevancy of most college four year programs is appalling in the majority of cases.

There have been limited reform efforts at the college level. Several institutions have developed open programs and have tried to pioneer the college of the future. The smaller cluster type structures inside a larger university or paracolleges within a university have been other examples of the recognition that change is

needed. But in about 99 per cent of the state college and university levels, the public domain has had little alternative. If the student was forced by one or more circumstances, such as finances, to go to the state institution nearest his home, he or she had to grin and bear it. Obviously not all of the campus scene over the years had been bad. Many students have learned a great deal and have fond memories of four to eight years in the ivy towers. But now has come the recognition, that in spite of all the good these institutions have achieved, the time has come for immediate reform.

In the remaining paragraphs no effort is made to solve all the ills of what we have mistakenly called "higher education." No profound words of wisdom or detailed analysis of the situation with specific blue prints for reform are intended. The nation has very few models of change which to observe. The movement toward new directions in college education is just gathering steam. But it is coming as evidenced by magazine issues such as the September, 1970, Kappan, which was devoted to teacher education specifically and colleges in general, by the innovations occurring in the smaller liberal arts schools, by the college-within-a-university plans, the school-within-a-school efforts, and by the smouldering student unrest.

Further, federal funds have become more heavily involved than ever before. The 3 million dollar research program in teacher education by the U. S. Office of Education's National Center for Educational Research and Development cannot help but have some effect. The Teachers Corps is committed to the notion that schools won't change until teachers change and teachers won't change until schools of education change. To this extent it has pledged its entire funding of 31 million dollars for a single fiscal year only to educational institutions willing to make basic changes in the way they prepare and certify teachers. Whether their present efforts toward competency-based education is the right answer is questionable, but certainly the ideas will cause reform in teacher education and in the colleges as a whole. Add to this the facts that present private funders such as the Ford Foundation are calling for reform in higher education as evidenced through speeches by their current leaders, and the demand that the National Association of Secondary School Principals is making for radical change in urban schools mean that conventional college programs are living on borrowed time. Technological developments, the attacks on compulsory attendance laws, and the schools-without-walls movements will hasten the end of many cherished traditions.

The major purpose of including this chapter is primarily to draw attention to the need for massive reform at the post high school level, and to offer some observations of ways this might be developed. A general look will first be given toward possible workable solutions in reorganizing the total college, and then at teacher education within that college. No one has the magic wand now. We can dream; we can draw from the experiences of the few colleges which have changed, and from the nine federally funded programs developed in schools of education in a variety of universities, along with other types of alternatives provided in various universities. Hopefully these comments will spark some dreaming as to what possibly can be done to innovate at the college level. And, of course, many of these same ideas can be applied to vocational schools, community colleges, and fine arts and business schools. There is a commonality of need in most all post high school institutions.

For purposes of discussion, assume a university of 15,000 students. Right away this begins to say "too big." Second, it begins to say "no alternatives," as

it probably is run in the same fashion for all 15,000. But we know that in individualizing education, having the same process for 15,000 is wrong. There are a dozen ways to attack the problem of change in both big universities or small colleges. Whether the size is 2,000, 15,000, or 40,000, the basic concepts work the same. For example, the institutions can be divided and subdivided into two units or 12 units. But the important point is that they not be left alone. For ease of illustration, only one example of one way to reform a major educational complex will be presented, but it should lead to speculation as to other methods.

This university of 15,000, serving predominantly a farming area, though growing yearly in diversified enrollment, could easily be divided into two colleges. One central administration for the university could coordinate finances, building utilization, and policies which would need to affect both colleges. Both colleges could have vice-presidents in charge, responsible directly to the executive vice-president and president. But there the similarities would end. College A and college B would be opposites, as could a college C and D if they were desired in a further subdivision, or as parts of college B. The more alternatives, the more options for individuals, the more humane the institution. But for ease of starting almost overnight, two may be the limit--at least for the first year of a major breakthrough.

Of the 15,000 students in the university, perhaps 11,000 might enter college A. It would remain a fairly large, structured institution, staying pretty much in its traditional mold. In other words, those status quo professors who still wanted to lecture on the M-W-F routine could stay in college A. A B C grades, class rank, G.P.A.'s, registration, and required textbooks could be retained; those students who were satisfied with the present large, rigid university system could have that choice as an alternative.

College B, on the other hand, could become a completely viable institution to meet the demands of the students. Its 3-4,000 enrollment would retain some of the features of the smaller college. It would have its own faculty. It could operate on individualized instruction with great amounts of independent study. It could eliminate grades and class rank; most prerequisites could be abolished. Daily schedules could be developed; interrelated curricula and teams of instructors would work together. Students could have heavy concentrations of off-campus experiences through internships and problems courses and one-to-one conferences with instructors. Requirements would be much more flexible and tailored to individual goals. Quarters, semesters, summer school would be replaced by the 12 month school. In other words, all the 69 changes listed in the glossary would be part of college B, plus several additional ones which could be added because of the age and maturity of the college students--and especially at the graduate level.

Within college B (or a separate college C could be formed, which might be a modification for about 1000 students), a different college C type program could be established if desirable. For example, suppose in a large state college there are some students who really wanted to go to a small private liberal arts college but just couldn't afford it. Further, they did not want the rigid structure of a large university, but did not care for the complete openness of college B. Would it be wrong to pull out a small faculty-within-a-faculty to develop a compromise program between open and closed organizations to meet the needs of 1000 students? Since college students, including teacher education majors, at this moment in their development need a Summerhill--a completely open type self-directed program. Reaching these students through this type of option may have tremendous effect on

the future of the United States. Many of them have certainly been potentially or actually lost to present efforts to improve the North American society by being driven out of the conventional system. Do we believe in alternatives in America? Should students be penalized for lack of money when it is possible to achieve the desired program within the present budget? Are state colleges here to serve the student, or are the students here to serve the state college?

In applying this to teacher education, if colleges A and B were formed, and perhaps college C, each could have their own teacher education program. For example, college A could house those college professors and those students who still wanted to teach in the self-contained room, or with 55 minute periods, rigid regulations, and all the rest. But those education professors and those students who wanted a more open flexible system could enroll in college B where they could receive their entire college training in an atmosphere similar to that in which they hoped to teach. This would overcome one great obstacle presently facing teacher education: the number of courses presently taken in the school of arts and sciences. In some institutions, 80 per cent of the courses, including the obsolete special methods, are taught outside the school of education. Thus even if the education professors change, they can effect only 20 per cent of the student's program.

Then, too, isn't it amazing that to teach "grade 12" the instructor needs all kinds of Mickey Mouse certification requirements, including many education hours; the school of education professors usually have taken these too. But why can a person teach "grade 13" students, only three months older, in a liberal arts institution, with no education courses and no state department certification requirements? Something is completely false somewhere in the preparation of learners-teachers-consultants.

Now, what if the university refuses to split into two or more colleges, even if the athletic officials are assured that all their star athletes can still play for the university of 15,000: the university could have just one team as now, or it could have one team from college A in a "big time" conference and one from college B in a "small time" conference, or college B could eliminate football in favor of cooperation instead of competition--at any rate things like football, dormitories, shared building space, and all the other mechanics can be worked out by committed leadership.

The school of education, by itself, can internally reorganize even if the college doesn't. One easy illustration provides for 70-80 per cent of the school of education remaining structured; but the other 20-30 per cent of the professors could set up their own school-within-a-school--called perhaps, the Center for Personalized Education. The key would be that this small group of teachers and students could set up a completely individualized teacher education program within the limits of the hours they have the students.

Thus many of the courses could be team taught in blocks of time with much independent study and small groups and conferences by arrangement. If the staff can be manipulated to the point that sociology, English, and other personnel from arts and science course numbers can be used by instructors with majors in the field, much more of the students' programs can be taught in the center. Ultimately the goal should be to make the center as personalized, flexible, and relevant as possible so that teachers can be trained by the same method they are expected to use when they go out to teach; if they want to work in an open school, they must learn in an open environment. For years teachers have been told not to lecture

to adolescents, while they as future teachers are being taught by the lecture method. It is time for reform in teacher education.

No one knows for sure how future teachers-consultants-advisors-counselors should learn. How are warm empathetic bodies developed? How are they taught "indirectness" as opposed to "direct" methods of teaching? How are they prepared for one-to-one relationships? Students select advisors on the basis of personality and being able to get along with that adult. Fortunately, at this moment in educational improvement, there seem to be at least six major areas which can be identified as essential phases for training teachers to work in the open schools.

One definite area is that of learning about learning; adults trying to help students learn really need to understand the learning process--not the theories, but what is the research. What do we know about learning--about motivation and reinforcement--what do we not know; how do we apply the knowledge in working with youth? This area has been greatly neglected; it needs more than 3-6 credits through lectures in educational psychology classes.

Another broad field is that of human relations. Heavy doses are needed in sociology and psychology, in group dynamics, in openness, and in knowledge and experience as related to how to interact with youngsters. Evaluations and observations in this area--a screening of potential teachers--ought to be an extensive part of the admission process.

A third need is that of individualization of instruction. This concentration would eliminate all the former methods, special methods, audio visual and other such courses. We are not talking about a 3 hour class, but a heavy concentration on how to do it. Separate courses are not needed for each subject area--the process is the same in most disciplines.

The fourth area involves at least a year of internship plus other school in the community experiences. Students should work with youngsters all through their college career to help make certain that this is what they want. They can work a quarter as teacher aides, a quarter as student interns, and a quarter as resident interns, for example, in an open school. They can work in orphanages, on playgrounds, on Indian reservations, in ghettos--wherever relevant experiences with youngsters can be obtained.

A fifth area relates to strong interrelated cognitive experiences. The teacher must know Spanish as Spanish, if that person is going to help another learn Spanish, but must also see how Spanish can be interrelated with French, English, social studies, art, music, drama, home economics, and math to name but a few. Thus the broader the base of the cognitive background, the more potential for interrelationship. Spanish can be taught as Spanish for the cognitive training, and art as art to the Spanish major for the interrelated cognitive background, but the two must be taught together in interrelated team experiences as part of the method of helping the future teacher learn how to do it.

The sixth area which must be part of the new teacher education efforts is that of research and evaluation. Future teachers must know how to evaluate individual students, evaluate curricular experiences, evaluate themselves, and evaluate the total program. This either must be organized as a separate concentration in their preparation experiences, or must be interwoven with the other teams, but they must be trained and committed to research and evaluation.

During the three to five years of college, the future teacher should learn in an environment similar to that in which he is expected to help others learn. The six areas mentioned above can be the basis of interrelated teams of "instructors." The old adage again says that the learner learns best when he teaches, and he learns best how to help a learner learn if he has learned in the system through which he will probably perform. The future teacher does not learn to be a consultant, guide, advisor by sitting in a desk for four years listening to pearls of wisdom and reading books. If he is expected to work on a one-to-one basis with students, he should have the same experience as a learner. He should work in open labs and have independent study opportunities; he should perform often in small groups, and only from time to time be involved in large group presentations.

One of the definite needs will be the elimination of present departmental assignments in most colleges. If schools are to be nongraded, and if curriculum is to be interrelated, it is awfully hard to envision how a secondary education department can be separated from an elementary education department, or psychology from educational psychology. How do you separate a 6th grader from a 7th grader? How do you teach a course on the middle school in the elementary department and a course on the junior high in the secondary department when they are both pretending to be talking about some strange animals called 7th and 8th graders? How do you teach administration of the secondary school separate from administration of the elementary school? Whatever the new arrangement, it should be apparent that ten or twelve separate isolated departments can no longer remain a viable part of teacher education in the 70's.

Nor can the dropout be allowed to escape with no effort to help. The new relevant educational program could offer an associate arts degree in education for those who completed two years of college, including a one quarter internship as a teacher aide. They would be certified as learning assistants and used in paraprofessional roles. Schools could then pick up well trained persons for a variety of roles in the new open concept programs with differentiated staffing. This person, especially the females, would not be lost to education by lack of money or marriage, and many later would probably return to finish additional college work. What a tremendous human resource for the nation, and what a human alternative for persons.

Unfortunately it will take another five years of struggle, chaos, and frustration as a number of pioneer schools of education look for more creative ways to help develop future teacher-consultants. The pilot programs now under way have given the nation a start. New ones are joining each year. Five years ago the great need was to develop open public schools, for even if teachers were trained for them, there were still very few in existence. But now at the dawn of the 70's, there are open schools, and the emergency need is for those innovators in teacher education to swing into high gear to provide alternatives for future teachers at a rather rapid, dramatic pace.

It often seems that it will never happen, but there is hope. Perhaps a fitting way to close this plea for reform in teacher education, and to give hope that it is coming is to present here the statements recently made by Dr. Ben Buck, Dean of the School of Education at Mankato, Minnesota State College. Dr. Buck committed the college, which is currently the 18th biggest producer of teachers in the United States to the start of a completely different approach toward teacher education. What plan will evolve yet remains to be determined at this writing.

But as a summary to this chapter, excerpts from the statement reproduced here as released by the Mankato State News Bureau may give further support to the hope expressed that finally humane college reforms are on the verge of reality.

Mankato State Reshapes Teacher Education

Work to reshape teacher education into an approach which those spearheading it hope will develop into a model for the nation is being started this fall quarter at Mankato State College. The activity is aimed at giving students in teacher preparation a choice in the type of school for which they wish to train--traditional, ultra innovative, or somewhere in between.

"It has been obvious to us for a long time that we should no longer prepare teachers for only one type of public elementary and secondary school," said Dr. Benjamin A. Buck, dean of the School of Education. "Public schools are now in existence which range from the completely flexible type to the very traditional."

With this in mind, a three-pronged approach has been developed to draw in a mass of information and ideas by the end of the fall quarter as a basis for reshaping the teacher education program. The triple approach will consist of a dean's advisory committee, department chairmen, and faculty as sources and sounding boards. Students and public schools will be involved too. Plans are to have a pilot program in operation by fall, 1971, in which a sizeable number of elementary and secondary teachers will be going through the new program in teacher education. Buck expects a phase-in period of two or three years in which all of the teacher preparation students will make the transition.

"The purpose is to provide alternatives to individuals preparing to teach," he said. "Some individuals will want to prepare to teach in highly innovative schools such as Wilson. Some will want to stay a while longer in the traditional school districts. Then there is the entire gamut in between--the various school districts offering moderate change, and all the rest."

Buck envisions that those going into teacher preparation will take a basic core of experiences and then branch out to specialize in the type of school that interests them most--"several different programs of teacher preparation in operation simultaneously which would prepare teachers for all types of existing public schools, and probably for some schools which do not now exist."

"We are not now preparing teachers for the types of schools that exist," he said. "We are not training teachers for the inner city schools. We aren't training teachers for Wilson. What we're saying is that many of the innovative things in education fail in the public schools because we don't have teachers to do the job. So if we're expecting public schools to do a better job of preparing their students and if this change is necessary to do the job, then we had better provide the kind of teachers who will help them carry the ball."

The Dean's Advisory Committee for Reshaping Teacher Education for the 1970's has the assignment of thoroughly reviewing the present teacher education program and the School of Education and coming in with a proposal by this Christmas. "We encourage the committee to get ideas from their colleagues, so the plan they finally evolve should represent the thinking of the entire faculty," said Buck. Faculty members will be encouraged to present plans individually for reshaping teacher education.

Another component involved is a proposal for a center for Curriculum Design in Teacher Education which would exist permanently to conduct continuing study in new methods, evaluation, and change. Looking ahead, the center would also be intended to determine what kinds of teachers the schools of the future will need.

"We feel that we are charged with reshaping teacher education on this campus," he said. "We believe Mankato State has been in the forefront in this business of preparing teachers, but we know with the rapidity of change today that we're going to have to work with a concerted effort to keep ourselves in the forefront and probably place ourselves into an even greater position of leadership in teacher preparation."

"We intend to develop a model which will be a model for the nation."

Theory into Practice

This chapter is designed for the school just beginning to change. It is not a far out 1980 look, nor does it attempt to add great depth to schools already heavily involved in change and innovation. But as most schools in North America are still run on 55 minute period schedules, or self-contained elementary rooms, or MWF college approaches, the 1970's will see a growing demand for help from these institutions, especially help on how to start. Therefore, the effort here is to assist staffs see how they can take only one subject area, without worrying about interrelating or other such aspects, and develop a different approach.

The frustrations of beginning the reform: the problems, the philosophy, and the need for national leadership and involvement are presented in the early pages of this chapter. The later paragraphs attempt to give an overview of some specific ideas that most staffs might use as a starting point. Physical education was the subject chosen as the vehicle, primarily because of the struggle educators from that field are having in visualizing how they can adapt to the retooling of the schools. The problems and ideas can be applied to any subject field; though all subjects need revision, physical education does seem to be in particular difficulty, and hopefully here can serve as an example of how staffs can begin to put the theory of this book into practice.

For the past several years, a number of the educators who have been labeled "innovators" have been debating whether required seventh grade general music or required seventh grade physical education was the worst taught class in the schools. In the opinion of many, overall the seventh grade still is the poorest year for students, and required general music at that level is the worst single course. But unfortunately, physical education seems to be the poorest taught subject on a K-12 basis. For that reason a number of educators have been carrying on a running battle with the American Association of Health, Physical Education and Recreation and former leading physical education schools.

During this period the author has submitted five reports to physical education organizations offering constructive criticism of the physical education profession: "Innovations, Lifelines of Physical Education"; "Our Overseas Challenge"; "Horse and Buggy or Space Age Physical Education"; "The Forward Look in Physical Education"; "A Pattern for Change in Health and Physical Education." As might be expected only one received major attention, and that was the one which was the least critical and probably the least constructive of the group. Further, nothing ever came of the ideas. None of the national or state organizations nor any of the colleges responded to pleas for innovation in physical education at the action level--conferences, yes; but new programs, no.

Speeches have been given to physical education groups at national, state, and local meetings. There has been some impact at the elementary level, but generally acceptance of change in physical education has been painfully slow; it is just now that the sleeping giant is beginning to stir. Fortunately some organizations and some colleges are looking anew at the field and are actually making some efforts to retool, but to date only a handful of projects have succeeded and generally with very little impact on the program for Monday in the red schoolhouse.

In these early paragraphs, the first effort is to briefly describe what is wrong in physical education; then an attempt is made to give some suggestions as to how to improve physical education programs, with emphasis on individualizing the approach. Most any subject could be substituted, but physical education can serve here as an example of the type of searching which must precede any major change. Thus this chapter is a further effort to relate some of the dissatisfaction which must accompany change, and then to point out some of the kinds of specific steps which can be implemented to achieve improvement.

The negative comments which follow are not intended to criticize the many excellent men who have worked so hard to improve physical education. A number of them have spent a lifetime in the field. Physical educators like Dr. H. Harrison Clarke and Dr. Arthur A. Esslinger of the University of Oregon, Dr. Joy Kistler, formerly of L.S.U., and Dr. Charles McCloy, formerly of Iowa University, to name a few, devoted lifetimes toward improving physical education; there could be a long list of other contributors. But in spite of all these hours and years of work by outstanding and dedicated individuals, physical education is still probably the poorest taught subject in the schools today. It has been the least well received as part of the school program and is fighting to stay in the required high school curriculum in many states. A minority of those teaching physical education belong to the national professional organizations attempting to improve.

Most physical education programs are still utilizing the same 1930 vintage model that many individuals have experienced. The majority of students have had no elementary school physical education program; it has been taught by the "self-contained" teacher. In junior high, the physical educators have thrown out the ball, although junior high is the best of the poor physical education programs; in most schools students still play touch football, basketball, and softball for three years, with a little track and rhythmic thrown in. A minority of schools include gymnastics and wrestling and/or a few weeks of individual sports. The high school program has been controlled by athletics; most athletes have no physical education program because they participate in sports for three years. Athletics still control physical education in most public high schools. Obviously there are exceptions, and there have been schools which developed excellent programs for the 50's and 60's, but unfortunately, most of them are not geared for the 70's.

There is another problem in physical education. There is no spark, no real clash of ideas. There have been many great individuals and there are excellent traditional books in the field. But as of today, there is no dynamic leadership, and nationally there are very few excellent programs. Controversial leaders are needed, whether or not the majority agree with all their ideas. Change agents are needed--those who will argue and fuss and force an examination of the present gym class rituals. Education is changing; physical education must too, but someone must rise to give the spark. Physical educators need to argue more, and then act.

Physical education is still involved in a mechanical circle. There have been improvements in physical fitness in the past few years. This is wonderful--most educators are for improving physical fitness. But in spite of this improvement, there has not been developed a really challenging kind of physical education program. The profession continues to go around the same circle of problems.

Recently a national figure in physical education spoke about some of the deplorable conditions in physical education. This was fine; more physical education

leaders need to point out present weaknesses in their own profession as a step toward the future. But, unfortunately, the man had given basically the same talk fifteen years earlier. What has been done in these fifteen years? Yes, physical education has improved, but not fast enough or far enough, and certainly not as much as other fields. We must speed up the process.

A further example of the lack of effort in the past was the disappointing report of physical education in the 1966 ASCD publication titled New Curriculum Developments. There seemed to be little that was new or significant in the field of physical education for that curriculum report. There is a lack of creative ideas; there is a lack of a fresh approach in physical education. There has been the President's Council, but it has had little effect thus far on moving physical education forward at the daily classroom level.

There is still an unfortunate participation attitude regarding physical activity. Many in America sit at a desk. We drive a car. We get involved in traffic jams. There are no facilities nearby in the neighborhood. To do pushups at home at night is a very lonely effort. Most have night meetings and fail to take time for physical education, even though we know we should.

What might we do about some of these problems in physical education? First of all, we could have a National Dreamer's Conference. We need to get out on Cloud Nine. To the conference we should invite anthropologists, psychologists, philosophers, physicians, political scientists, sociologists, and health and physical education experts. We need to talk about what health and physical education and recreation should be like in 1970. We need to dream about what it might be like in the year 2000. We should put the best efforts and best thoughts into creating the kinds of exciting, dynamic, individualized physical education programs such as are needed throughout the United States.

A second thing that should occur is a new AAHPER--a new national association--an organization with teeth. The AAHPER tries to compromise too many philosophies. The new organization should be more outspoken. Membership would increase because there would be more with exciting ideas. AAHPER needs to lead out with new programs at the national level. There is a need to develop curriculum projects, to plan national summer institutes, and to increase the amount of federal aid. Another direction should be to fuss at poor college programs. The majority of those institutions producing teachers are mediocre or below average in terms of good teacher-training programs; their graduates do not develop excellent programs. From the national level we could work to eliminate extra pay for coaches and put them on a 12-7 day instead, thus improving physical education programs. Coaches should not teach five or six physical education classes and then try to coach three hours. There is no way but to let the classes they teach suffer, regardless of whether they are assigned physical education, math, or any other subject responsibilities.

The AAHPER should hire new types of national leadership. They should hire needlers--real change agents. They should hire dreamers--people with creative, innovative new ideas. They should hire implementers--people good at seeing that things are accomplished. These three, as a start, could form a national team for innovation. Their coordinated leadership would undertake major national projects.

One national project would involve six elementary schools, six junior highs, and six high schools chosen from around the United States. These eighteen schools

would be picked because they are doing exciting things now, or are planning exciting innovations in physical education. They would be in districts where good programs are supported locally. Each of these schools would work with one of the eighteen universities chosen from throughout the United States; the criteria for universities would include a reputation for creative talent on their staffs. The schools and universities, working as a team, would be joined by local, state, and national HPER associations, who would give all kinds of support, publicity, consultants, and anything else needed. These eighteen programs would get underway immediately with each one perhaps innovating in a different direction. They would develop eighteen programs as pilot efforts, and if successful, these could be disseminated throughout the United States. Physical education should start now. Operation Headstart showed us that we can do this in a very short time. We could have this project underway with very little effort. At least two school years would be needed for total fulfillment. We need crash efforts now.

We have a few new ideas in physical education but not enough. We need more and we need to rekindle some old ideas that were never adopted. Perceptual motor theories, for example, spell out the significance of motor activities for ages three through seven. Most school districts do not have full-time elementary specialists for each school, yet they are the most important years. In the studies of kindergarten children, the greatest deficiency of many has been in the area of motor encoding. But where is the physical educator in most kindergarten and first year classes in the United States? It is further interesting to note that the perceptual motor material has been quite important in remedial work with the retarded children projects, even at the junior high school level. We do have some new materials in health education, but most schools are not involved with them yet. We should be using the concept approach to teaching health. We need more of the School Health Education Study efforts.

Physical education classes in the secondary schools should be optional. Even where physical education is optional in the elementary schools, if a good program is available, students choose to participate. If we provide a firm base and good attitude in the elementary school, if we show the necessity of physical education, if we have interesting and challenging programs, we will not need to lobby to keep physical education required. Arrangements can be made for those who always avoid physical education, but there would be few of these persons if programs were tailored on the basis of need, interest, and ability. A few schools have all subjects, including physical education, optional K-12, and students do choose the subjects providing relevancy.

The movement education approach offers the most refreshing idea in physical education, but this is having difficulty gaining acceptance. Fortunately universities like Simon Fraser are now developing movement education programs, and starting where it is most important--at the elementary level.

A new revised journal would help. The present AAHPER Journal is rather inadequate as far as aiding the development of a challenging, creative, and innovative type profession. It does not stimulate. In summary, when one surveys the field of new ideas in physical education, there is not much available.

Though a 1960 concept, most physical educators are not heavily involved in teaming except at the coaching level. Schools need to have team teaching and daily scheduling as part of the physical education programs. For example, if 180 boys and girls are assigned to a block of time for physical education, they

might have six teachers. These six should not divide these students into groups of thirty and work in isolation. They should work as a team to be able to create dynamic individualized programs through the benefit of professional interaction.

In teaming the instructors pool their abilities, ideas, successes, and failures. They plan, instruct, and evaluate together. They teach some classes in large groups because there are a few times when 100 or 180 can work together in a physical education activity. They teach classes in small groups because there are times five or ten make the best group. They use independent study and individualized activities where students can work on their own, either as part of a class or during unscheduled time. Open instructional labs and recreation labs are a great blessing in physical education. Most programs can function best in an individualized open lab situation. Team teaching can provide the developmental and corrective programs lacking in most schools. It allows the best instructor, whether male or female, to teach the class. Further, they can vary the amount of time for instruction. Some days they may need ninety minutes for their classes; other days perhaps only forty minutes are required. Teachers should be able to request the time they need on any given day. Five fifty-five minute periods are not the best way to teach physical education. In optional attendance schools, students spend as much time as desired in physical education--all day if they wish.

Further, the old football, basketball, softball curriculum needs to be replaced by more appropriate programs for individuals. As we look at the world of 2000 A.D., HOME FITNESS PROGRAMS--with treadmills as part of the basic furniture--need to have priorities for city dwellers. Neighborhood clubs should be stressed. Large group sports should receive less attention, as should expensive space and equipment individual sports. The programs that should be stressed are those physical activities which an individual can do by himself in small spaces. Then should come family home activities that are becoming possible in our society, such as inexpensive indoor home swimming pools; the neighborhood club concept is next in importance, followed by individual traditional activities. Last to be taught in the upper years should be football type activities. This does not mean team sports should not be offered as part of some programs, but they should be included after the others are provided for, not as first priority. The home fitness lab, physiology of exercise, and a real commitment to daily activity, with equipment, space, and activities that are possible at home, should have priority.

There is need for a new kind of publicity. We need neighborhood handball courts. We need local exercise clubs. The things we don't have reflect the present physical education programs. Generally the publicity is poor. When people vote, they often vote against physical education; when people do things they sit; they watch TV rather than play handball or take a walk. We need to mirror physical education programs in the community. Parents will pay heavy prices for tickets to professional football games and for stadiums to support the teams. They pay weekend motel prices and drive long distances to see the games. They watch five or six TV games each weekend; but they won't vote money for physical education teachers for the KINDERGARTEN.

Many physical educators hold key positions at the local leadership level. They have important parts in the change process. Some must be research and development men; they must invent new ideas. Others must be diffusors. They must help to spread the new ideas. The mechanics of change are difficult. It takes four weeks, eight weeks, sometimes three months or a year to get people to understand why we

are changing and how we can change. Some must adopt and work with materials to see that they are actually improving what happens to boys and girls. Some must get busy and do what has not been done.

We need a national explosion in health and physical education. If many physical educators began massive excited national movements under dynamic leadership, the programs we dream about could become a reality.

Turning now from the negative to the positive, if what has been indicated above is basically true, and if some of the above broad suggestions make sense, the question still faces the practicing physical educator: "What can I do right now in my position and in the gymnasium?"

Here are some specific suggestions:

- (1) See to it that there is an excellent "kindergarten through second grade" physical education program in the district where highly trained physical educators work on the individual/diagnosis/prescription basis with each child. The high school program may have to suffer during this adjustment period by giving up staff, money, equipment, and facilities to the elementary school. With adult volunteers and paraprofessionals, the adult-youngster ratio must be reduced to 1-10.
- (2) Within the situation available, give 150 per cent for a year or two, rather than 80-100 per cent, to the instructional physical education program. This is essential while implementing rapid change; be prepared to accept many periods of frustration.
- (3) Refuse to teach five classes and coach, even for extra pay--or at least coach only one sport.
- (4) Individualize instruction--have every child in an individually prescribed program.

All this can be accomplished; presented below first is a rather easy illustration of individualization; illustrations of a more complex nature follow later. Calisthenics are a simple way to start demonstrating how individualization can occur.

In most physical education programs around the states, the students come out of the dressing room at a given time and line up for roll call. The instructor often has group warmup or group developmental calisthenics. As soon as the instructor has done this, he has made a serious error. Yet about 90 per cent of the physical education programs in America still operate that way. The group prescription in the physical education classes generally does damage to individuals. The dosage for the advanced physical fitness students is not tough enough and yet it is too strenuous for the less fit individuals. Having everyone do the same type of sit up can often do further damage to the child's physique, as it may be just the opposite type of sit up from what he needs for his particular posture or developmental problem.

What must be done in physical education is to individually diagnose and prescribe for the needs of each individual the same as a doctor would diagnose and prescribe for his patient. In the area of calisthenics, the instructor can give a series of fitness tests, can evaluate posture, can give skills tests, and can make subjective analysis of the needs of the individual. Based on the best possible judgment and test results, each individual student can be given a calisthenics prescription based on his particular needs. The specific exercise to be performed,

the number of repetitions, and information as to when to increase the repetition can be described on this sheet for the individual.

Armed with this information, rather than exit from the locker room and line up for roll call and calisthenics, the student can come out and begin working on his individual prescription. As he does each of the exercises, he can record his progress for that day. The instructor is free to move around the gymnasium helping individuals and evaluating the progress of individuals.

Some students may need to be on an individual developmental program most of the week. Others can be on it only three times a week, while many may spend only 10-15 minutes each class meeting. Group work can be provided where individuals have common needs and can work together on certain exercises. Fun activities or a break away from the traditional calisthenics can be provided those remedial students by occasional group activities in a sport suited generally to the developmental level of the individuals involved. One reason why coaches must not teach five physical education classes and coach in addition is that they must create individual prescriptions for all the students in the class as well as their athletic teams. The way it is now, administrators dump one-third more students into physical education than other classes on the basis that physical education is play and does not require preparation by the teachers. When the instructor finds himself writing 200 individual prescriptions, plus 50 more for the track team, he gives up and instead as an escape, plans group activity oriented physical education programs during the five periods so that he may spend more time on individualizing with his track team. Obviously a brand new prescription is not needed everyday, no more than the doctor changes the prescription for his patient everyday, but an individual prescription needs to be made, then reviewed from time to time, and an alternative prescription prepared when the present one either ceases to be adequate, has overcome that problem, or proves that it is not getting the job done.

Relating this type of individualization to class activities, it is practically unnecessary to require a group to come to physical education at any given time. Generally physical education is taught in an open lab environment. The students come to the lab during the time they are not scheduled in other activities and work at their own program and at their own pace. It has been found, for example, that a student accomplishes more attending three 90-minute lab periods, than in five 55-minute traditional periods. The girls enjoy coming more because schools provide hair dryers and mirrors, and allow them enough time to shower at the end of the 90-minute period so that they can look pretty when they leave the locker room, instead of worrying over damp hair, lack of make-up, or a rushed job of getting dressed and back to class. We also know that physical education in kindergarten is more important than in the high school. The same kind of individualization and open lab activities can take place in the elementary as well as in the high school. However, more structured scheduling, grouping, and 1-10 ratios are essential at the 5-6-7-year-old levels to make sure they know when to get to physical education and how to perform. Obviously they need more direction than seniors, but when allowed creative time in the gymnasium, they do a beautiful job.

As students come to physical education for their so-called regular activities, the instructor must do the same kind of diagnosis and prescription as related to the sport activities appropriate for the individuals, as he has with the calisthenics program. Flag football, for example, which is the common curriculum all over the United States in the 7th grade, is not appropriate for all 7th graders. As was mentioned before, some 7th graders are 9th graders and some are 5th graders,

and some can throw the ball 50 yards and some 15, and some like flag football and some do not. To put all 7th graders into a group taught flag football class is an absolute tragedy.

Therefore, the coach must decide which ones of the students are ready for flag football, at what level of flag football, and what skills are needed. During the open lab period, it does not matter whether 6th, 7th, or 8th graders come into the gymnasium or on the play field. The question revolves around whether the individual is ready for the instructional part or game part of the flag football program that the instructor and students have planned for that day. Individuals and small groups of students can be worked with in the open lab situation. There are usually enough in the gym to form groups when the instructor or students so desire. Many students work part of the time on their own in independent activities because they are the only ones with that need or at that level. At other times they combine with students of like abilities for participation in a game or for small group instruction on a similar skill. When students are allowed to self-plan and direct their own physical education program, the level of individualization is much easier for the instructor and much more relevant for the student.

If the instructor feels he must have the group sent at a certain time in a daily scheduled school, he can request that particular time by turning into the scheduling team his need for that particular day; thus it is still possible to get large groups or a certain homogeneous group when needed. Of course, in the traditional schedule, teachers can easily do this because the same students come everyday and here the instructor must merely plan appropriate activities for the group sent to him.

When the individuals finally arrive, regardless of how they got there, some should work most of the period on individual developmental activities such as calisthenics, weight training, and rope climbing. Other students should spend part of the period on individual work and then participate in a small group activity such as badminton, basketball, relays, or instruction in a certain skill of a sport such as the forehand in tennis or a certain step in dancing. When a large group is needed, such as for volleyball tournaments involving six or twelve teams, the instructors may request the students who have learned volleyball to the level of performance required in the type of tournament planned. In other words, there is a need for some homogeneous large grouping in physical education, some heterogeneous large grouping, some sex grouping--sometimes the boys and girls should be separated for certain activities and sometimes they should be together, but in the assignment to physical education there should not be a separation into boys and girls physical education; instead the staff should work as a team--and sometimes the large grouping should be on the basis of interest in a certain activity.

Small groups should function similarly, sometimes homogeneous and sometimes heterogeneous. Individual activities should be prescriptions for that particular person based on need, interest, and ability. Loop films, tape recorders, film strips, and movies should all be available in the resource center for students to study physical education activities, as well as a number of books and pamphlets for them to read; in other words, several types of instructional materials should be included in this center. It is possible for most students to learn tennis without an instructor if they have a self-instructional Unipac type package. Lab experiences are obviously needed in physical education; the large group, small group, and independent study can be either sitting or activity oriented. The lab experiences generally are activity involved. Research projects should be undertaken by the staff whenever possible to determine results of specific programs

with specific students. Except for a required prescription, the activities chosen by the students, especially in the upper years, should be on a self-selection smorgasbord basis. The more home fitness, lifelong individual or two-man activities which are planned, the less grouping is a problem, and the more carryover for the student into the world of the 80's and 90's.

It is possible to spell out in physical education a complete individualized program for all students in all activities. Sometimes in this individualized program the student is with a large group, sometimes he is with a small group, sometimes he works on his own, and sometimes he has a specific lab problem assigned. More of the gym floor work is done individually or in small groups. There is nothing theoretical about an individualized program in physical education. It is possible if the administrator will give the physical education person no more of a load than any other teacher is expected to carry, and if the instructor is dedicated toward improvement for each individual. The instructor who is more concerned about athletics and/or does not have time for 200 individuals on the gymnasium floor has been the cause of the sad plight that we find physical education in throughout the United States.

In summary, in order to correct these deficiencies in physical education, instructors should be given a load no greater than instructors in other subjects; teacher aides should be available in physical education as well as, if not before, other classes. The person who is coaching should not teach five physical education classes in addition, and should not be paid extra for coaching, but instead should have built in as part of his load the coaching experience. The instructor can write self-instructional materials and should purchase through school funds loop films, tapes, and other types of media. A whole new vista in physical education is possible.

There is need for an entire book to be written on this subject; it should spell out in detail how physical education can be an innovative, exciting, individualized experience for all students. As we personalize programs in the schools and give students choices, we find that many of them do not select physical education. Their experiences in the area of the psychomotor domain have been so bad that the affective domain has been damaged, and thus the cognitive, motor, and affective domains never reach the potential of their merger. Physical education programs can be individualized and personalized to the extent that students want to get into the program. There is no need for the pressure of required physical education after the early years for most students, if the right program is started in the kindergarten. Where the student has difficulty in physical education in the upper years of school, it is often best to let him drop the activity for awhile and then get him back into it when the affective domain has been satisfied. Requiring a student who is negative toward physical education and who lacks skill in the activity to take another semester in a group prescribed traditionally oriented physical education program is another one of the errors we make in education.

With a real commitment toward better physical education programs through a philosophy of individualization, and armed with a book describing specifically how it can be done in each activity, written by innovative physical educators, most any school in America can tremendously overhaul its entire physical education program. It can be done; many could write such a book if given time, but the hope of this brief chapter is that it will spark some administrators and some physical educators to rethink their entire attitude toward their programs in health and physical education. Further, hopefully it will serve as an example of how to start putting theory

into practice--of what can and must be done in all subjects in the schools still operating group paced and sometimes group ability paced required programs. Individualization is a practical goal for all schools.

Chapter 20

Research and Childhood

Combining research and early childhood into a few short pages is like trying to condense a twelve volume history of the world into one page; the purpose in these few paragraphs, then is not to go into a long discourse on research and evaluation and early childhood, but primarily to draw attention to these two areas which have been woefully neglected in education and to plead their case. Additionally, some of the comments should offer suggestions as to how schools and school districts can immediately begin to improve in the area of early childhood, so these two types do make natural partners for the 70's.

In the area of early childhood, at long last, we are finally beginning to focus national resources on the problems and opportunities associated with learning experiences at young ages. Many books have been written, psychologists like Piaget have contributed immensely, and Operation Head Start has given hope. Even more we are gathering tremendous research in this area; many diagnostic tests and prescriptive materials are now available to educators. Studies done such as the one by Kirschner and Associates from Albuquerque, which surveyed 58 communities from July 1968 to January 1970 and reported 1496 changes in local education and health institutions "consistent with Head Start's goal of assisting poor children and their families to develop their capabilities more fully" are bringing to the nation fresh insights to children ages 0 - 8. We are learning that the early childhood years are the most crucial in an individual's life.

Even the latest study of "Sesame Street" by the Educational Testing Service gave excellent support to that effort to upgrade the learning of disadvantaged children. Among the many evaluation results were the following findings: children who watched the program showed greater gains in learning than children who did not, and this was true for disadvantaged inner-city children, advantaged suburban children, isolated rural children, and children whose first language was not English; children who watched the show gained most; 3-year-old children had greater gains than older children; those who watched the programs with their mothers and then discussed it gained more than those who did not. One of the conclusions stated that the TV program is "one of the most remarkable educational experiments ever undertaken."

Yet there are still some states without publicly supported kindergartens, and many districts without programs for five year olds. Practically no communities have publicly supported programs for the 4's and 3's. The 5's programs are usually limited to 2½-3 hours; then the 6's are stuffed into a rigid graded classroom where they are divided into groups and where many receive the wrong prescription. In the next ten years, school districts throughout the United States will give great attention to the needs and interests of ages 3, 4, and 5. Philosophies will be dramatically overhauled. If money is short, the senior class will be cutback before the kindergarten. These trends are developing. In the meantime, what can be done immediately?

A few schools now have all day programs for the 5's at public expense. They have done it by a reorganization of the structure. For example, by eliminating self-contained rooms, they have freed space to be used more flexibly. They have been able to create industrial arts and home economics areas. The staff is better

utilized. Physical education specialists, industrial arts specialists, science areas, and all other important programs for elementary children can be developed by the same staff in the same building with the same budget, although more money should be fought for to improve the opportunities.

By reallocating staff, more adults can work with kindergarten children, many of whom will be men. Daddy is badly needed in the kindergarten. Motor subjects like physical education take priority along with the affective. In the all day kindergarten, reading and math skills can be taught to those who are ready, and most children are ready sometime during the year. By using parent volunteers and by hiring paraprofessionals the adult-youngster ratio can be reduced to 1-10, which is about maximum.

Programs for 3 and 4 year olds can be started by having older students help. This is especially true when schools can arrange, as some have, programs where junior and senior high students, both boys and girls, as part of their home economics or family living or psychology or sociology classes, meet many of their class goals by working weekly with the young students. Babysitting, child care, child growth and development units, for example, provide excellent year round help. The more the secondary program features independent study and individualized approaches, the more feasible this becomes; obviously location near the junior or senior high helps, but this is not a real problem through a slight bussing arrangement. Schools have even purchased twelve passenger vans to run students back and forth to projects for the school in the community concept, and the early childhood program can be one of the opportunities.

Through such arrangements, public schools are actually conducting part-day 3 and 4 year old programs and full days for 5 year olds at no extra cost for the district. By the use of parent volunteers, student help from class work and other volunteers, paraprofessionals, student teachers where available, and robbing some money and positions from the high school budget, exciting beginnings can be made. The imaginative districts with a real commitment are developing programs for young children.

Further, much more freedom is being allowed early childhood students. They are learning to be more self-directing. They go by themselves all over the building in some programs. They select industrial arts and home economics; they learn to sew on the sewing machines and use the simple power machines in shop. They decide when they want to go for a snack. There are programs in operation--not theoretical, but practical examples--where young children select teachers and wander throughout the building with more freedom than given high school students in many of the current districts.

What schools are finding as they work with these youngsters is that individually they are so different that they, more than any others, need personalized programs; they develop in such different stages. Some are ready to read at age 4 while others are better off to wait until age 7. Some are big and strong and have excellent motor development, while others are two years behind general expectations in physical and motor growth. Some handle freedom and responsibility beautifully; they can be turned loose most of the day and fairly well self-direct their activities, while others still need constant supervision, structure, and direction.

The mechanics of operating such a program are still in flux in a number of districts. In some they move from room to room; in others they operate from a home base, but move during the day to various centers; still others are kept in one general area

but with many alternatives within the center. More districts are now turning to the possibility of 6 year olds (the 1st graders) staying in the early childhood center as headquarters and fanning out from there. Much has to do with the physical layout of the building as well as staff attitudes. Group structure is still needed in the first months of such a program, but periods of freedom are built in to give the youngsters opportunities to learn to make choices.

There are no recommendations to give which fit every student and all districts. Obviously 3 and 4 year olds generally need more supervision and guidance than 5 and 6 year olds. Assuming that districts will attempt to start pre-kindergarten programs in the near future, and realizing that many of the present "kindergarten" and "first grade" experiences are appropriate, the following suggestions for starting limited 4, expanded 5, and modified 6 year old programs are offered.

(1) There should be a headquarters or home for early childhood where the students can spend the day, be taught certain skills, play, return to when lost, hang their coats, or generally seek security or feel at ease. However, remember, that some of the students will only report there to check in at the start of school and check out at the end, and perhaps be there for some activities during the day, but many may spend the majority of a day in the shop, science, home economics, physical education, and math areas, rather than the early childhood center. Depending upon staff, many of the activities can be available in the center, but most early childhood areas don't have space or adults for extensive industrial arts, home economics, and physical education activities.

(2) The former first graders can become part of the early childhood program, or they can be left outside it. More and more it seems advisable to keep the students in an early childhood pool and then let them out into the self-direction program as individuals; thus some would leave at age 5, some at age 6, and a few at ages 4 or 7. This really begins to provide for individual differences. Those who read early and are responsible can walk down to shop by themselves with no difficulty; those who are shy, or irresponsible, who can't read, who need security can stay in the pool or suite of rooms as many hours or years as desirable, and can be taken to other areas of the school in groups.

(3) Generally the 4, 5, and 6 year olds should be moved in groups part or all of the time until about Christmas in the nine month year. The 4 year olds need more group movement to home economics, for example, when they are first learning to operate in that area. The 5's need less of this, but during the kindergarten year they usually should be moved in small groups so that they experience activities in all the areas. This gives them a chance to discover where the art, industrial arts, home economics, physical education, science, math, and other rooms, materials, and teachers are located. Many of these activities can be carried on in the center, and should be, but the center activities should be supplemented or substituted for by experiences in the special areas. Learning to accept freedom of choice should be a major goal in the early years.

(4) The 6's need modified group movement in the fall, depending upon the individual. Some know how to read, they know the teachers, and they know what things they want to learn; the first day they are off and running like strong "third graders." Some, of course, are still completely lost and seem to fit better into the shelter of the early childhood center. Most are still in between; therefore, whether they operate from an advisor they have chosen as they do in some schools or from a "homeroom" base, or from the early childhood center, they can be given daily schedules where during the week about half of their time is scheduled into

equal amounts in all the traditional subject areas--some art, some reading, some math, some science, some home economics, and on--and then the other half of the time during the week they choose when and where they want to go and for how long. By Christmas most are generally ready for a complete self-selection program.

It is amazing how well 5 and 6 year olds can accept responsibility and be self-directing. All they need are opportunities to show and develop it. Always remember that some are ready at age 4 and some are not at age 7, but the general pattern is that most can handle greater amounts of freedom within the center and lesser amounts in wandering the building; however, most usually become quite self-directing during the early part of the old "1st grade"; they do not need constant supervision and direction. Then, too, some 9 year olds need tight structure, whereas the 6 year old is quite independent. Again, plan the program for the individual--not for kindergarten or 1st grade or 3rd grade groups. For the district just beginning to give freedom to 5's and 6's, keeping the 6's as part of the early childhood program, moving them out first as groups, and then giving them freedom as individuals seems to work well.

(5) The early childhood center should be about 2/3's carpeted so that all kinds of floor activities are possible. About 1/3 should be left with easily cleaned floors for extremely messy activities, and for programs where wood or asphalt tile or other is a more appropriate surface. The room should have bright multi-colored walls, and lots of interesting live plants and animals. Guinea pigs are just excellent pets to live in the center and many should be available for those students who enjoy a furry friend.

The above suggestions are not earthshaking nor in detail; the major message is merely to convey the need for 3 and 4 year old, and even 2 year old publicly supported programs, and for full day 5 year old offerings. Further it is to suggest that most 6's can be treated with great amounts of freedom and responsibility and can function with amazing self-direction. These "open" early childhood programs are now available in a few school systems, but in the coming years they will be quite common. The real tragedy is where no programs or only traditionally planned group half day kindergartens and self-contained first grades are the rule, with no alternatives or options for students or parents other than private schools. Each district is obligated to look anew at their efforts for these early age youngsters.

That evaluation effort leads to the second part of this chapter relating to research. As was discussed earlier in the book, practically all of the conventional programs exist without adequate research support. Even worse, school districts are doing practically nothing to change the picture. Education must develop a research and evaluation stance--and that stance must be more than Iowa Basic Skills Tests. Innovation is needed in evaluation and more staff and money must be channeled in that direction. More reliance must be placed on subjective analysis and more concern must be given to the affective and psychomotor domains.

Why do schools give class rank? It is a horrid form of discrimination. As discussed in Chapter 16, most schools don't separate the Catholics from the Lutherans, though maybe they should; we try not to separate the rich from the poor in the public schools; we are trying to prevent separation of the blacks and the whites. If we really believe in non-discriminatory practices, then how can we justify separating the smarties from the dummies--and that is all class rank and grades do. Soon court cases will resolve this failure of educators. But in the meantime do we have any research to validate the giving of grades in a humane school?

The answer is again, no research! The answer is the same in examining almost any of the practices of the public schools.

Educators can immediately do three things to beef up their research and evaluation potential. Depending upon the size of the school or school district, one or more persons with research ability along with clerical aides should be hired. It can be done within the current budget, but it again does mean a re-allocation of allotments. This job or these positions are responsible for inhouse research and evaluation. Surveys, testing, report writing, and resource contacts can be part of the job descriptions. It is amazing what one or several individuals with clerical aide can do in a building. This inhouse data provides immediate feedback related to many concerns.

A second thing is for the district to set aside a small amount of money the first year, gradually increasing the total until a first class evaluation effort is built in as part of the district essentials.

A third effort can be made by contacting nearby colleges and offering master and doctoral candidates the students and problems to be researched; college classes can gather data; university professors can analyze small parts of the program to gather information for a book or their teaching; contracts can be signed with colleges to provide outhouse evaluation.

Of course, some systems are now putting large sums into accountability and assessment packages. This is fine that they want evaluation of their programs, but almost all deal with tests which study group comparisons in reading and math skills. What about evaluating whether the students like school, or whether they are learning to learn, or whether they now accept more responsibility than the year before, and what effect the current programs, policies, and staffs have on these factors.

Only a few universities have taken the lead in providing research and evaluation centers in education. Only a few of the few have done much at all with the affective and psychomotor domains. But even more, what have the public districts done to evaluate at the day-by-day grass roots levels in the schools. A handful of big districts have research offices, usually pitifully understaffed and charged with cognitive results. Several districts have placed evaluation directors in specific schools. But in probably over 90 per cent of the districts, very little or no money or staff at all have been provided for research and evaluation. The allocation of both staff positions and budget monies clearly indicates this catastrophe.

Schools can start research and evaluation programs if the commitment is there. True, they may be small efforts in the first years, but if we really believe that the functions are important, then they must be programmed into the budget.

These merely introductory comments in this chapter hopefully at least make educators again reflect on glaring deficiencies in the present conventional school systems. Nothing has even been mentioned in this book in any detail for specific reform in "vocational education" and community colleges, other than that presented in the pages relating to reforming college education. There are many other omitted areas, not because of their importance, but because of time and practical experience factors. But educators must change all these facets of the total educational system.

As innovative, humane schools are created, the plea is again repeated not to make the same mistakes of the past system and omit crucial areas of need or revision. Early childhood options for 2-3-4-5-6-7 year olds are non-existent in most districts; research and evaluation is non-existent in most districts. The few exciting school districts in the United States are taking giant steps forward to fill these gaps and further get on with the task of developing significantly different and better educational opportunities.

Chapter 21

Nuts and Bolts

This chapter will certainly be questioned by some, probably will be controversial to all, and seem to conflict with previous statements made in this book. Thus the easiest thing would be to omit these comments, for actually the material does not read as a true chapter, but rather as a series of items picked at random. The main reason for including these odds and ends is that as more and more persons become interested in the process of starting massive change in schools, educators constantly raise questions that really are minor nuts and bolts problems, but ironically do cause all kinds of friction during the changeover in most schools. For example, often principals will say, "We now think we understand how to individualize instruction, but what can we do about communication systems regarding assemblies, attendance, announcements, and new students?"

The easy answer is that each school must work out these solutions to the satisfaction of the specific staff. But instead of ignoring the entire problem of nuts and bolts, or only giving the author's personal preferences, several items have been selected here from representative schools to show what kinds of difficulties arise at the practical everyday level and how various staffs temporarily resolved these areas of conflict until more permanent agreements could be reached. Seldom have any of these minor areas stopped the total innovation effort, but they have caused arguments and upsets among the staff. Even after two years, many members of a staff are not happy with the solutions reached as of that date, but at least the school develops a base from which to operate. The first topic deals with the orientation of groups of students, especially following long vacations; the others deal with homerooms, group names for scheduling purposes, assemblies, visitation policies, parent communication regarding course requirements, and student selection of advisors.

GROUP ORIENTATION: The first two weeks of school in the fall normally find changes of staff and students (even in year round schools, this big switch usually occurs in September because these programs are still in the minority nationwide). Thus the simple way to organize is to place students in temporary "homerooms" by age level to help get the mechanics underway for new staff and students, and to make any massive changes in program agreed to by the staff. In a true year round school, this may only need to be a very short introduction, or especially geared for persons new to the school.

It is helpful to schedule students into "must" orientation assemblies the first three days where each of the various teams get a chance to introduce staff members and discuss with or present to the students the "shoppers guides" of possible experiences, or policies in that team or those areas of concern. This way the staff is assured that each student is at least exposed to the potentials of all areas, and that the student has been encouraged to visit the various centers and discuss programs of study with many teachers. Further, each has had an opportunity to at least see, if not meet personally, all staff members.

Other than these group assemblies, the students window-shop on their own during the first weeks and follow the optional choice program. During the second week, they request their new advisors and then later record their chosen areas of study.

These can be changed at any time, but an initial selection seems to help most everyone off to a good start.

Though this may seem rigid, remember the year should still be considered a twelve month year--the student can continue straight through until August, even if in only a separate summer program, and then in September continue the same experience with the same advisor with no interruption, other than vacation, except where a staff member has left. This two week "group period" is merely a concession that in reality until we have complete differentiated staffing and true year round schools, most districts are still locked into group teacher contracts, parent transfers, and "summer vacations"; thus this time allows any necessary retooling of staff and program. Perhaps it is a poor analogy, but the assembly line in the auto plant stops for a period of time to convert to the new models. The short interruption is merely a retooling process to allow the latest designs to roll into high speed production.

These group orientations are especially helpful for young students: the traditional K-1 persons should usually have some of these group sessions periodically throughout the year until the various individuals are able to be pretty much self-directing. They should be allowed great amounts of freedom, however, during these years and should choose their own teachers and classes. As was discussed in Chapter 20, most schools find it best, especially if they don't have 3 and 4-year-olds, and full day 5-year-old programs, to group structure about half of each week of the "grade 1" age level students into each area of study on a balanced diet of equal amounts of time so that the young folk have a chance to receive basic orientation in all the various centers, at least in the fall.

During these shopping weeks, terms such as 7th grade, homerooms, and others can still be used when external or internal forces deem this best. Generally, though, these terms and organizations are only for expediency. For example, on the district census cards which help determine state aid, most still mandate recording of a "grade level," for state aid is often a different amount for various grades. As more schools and society in general become truly involved in all aspects of the year round school, non-grading, and individualization, these "old practices," even on a temporary basis, will not be as necessary, but at the moment they sometimes are forced upon innovators; therefore, the program must operate within the confines of reality; hopefully the total flexibility concept for which we are striving will soon be possible all over North America.

ADVISORY: A period of time, such as from 8:45-8:55, may be referred to as Advisory. Attendance of all students should be encouraged, as advisors have a definite responsibility to point out to each of their advisees the advantage of attending Advisory as a means of school communication, as an opportunity to receive messages, as a means of making individual appointments with the advisor or setting up group counseling sessions, hear announcements regarding school programs, allow for the official attendance to be taken, discuss improvements in the school, conduct group seminars related to relevant interests, or plan student involvement in areas of concern.

Students who do not come to school in time for Advisory must check with their advisor by noon of the same day to mark off attendance so that state aid can be claimed; attendance slips may be collected at noon. Students should be encouraged to see their advisor for at least a minute so that they can determine if there are messages or appointments.

However, even though under this system Advisory is optional, the same as all other classes, students and teachers should be encouraged not to wander the halls from 8:45-8:55. Teachers should be in the centers available to students, not in the coffee room. Students should usually be in individual or group sessions during this time, or planning their day. Where there is no Advisory period, subjectively the opinion is strong that there is a definite communication gap. At least during these ten minutes there is a chance to say hello and help students plan their daily schedules; the success of the entire program is built around communication between the advisor and the advisee.

Unless there is a very special reason, the intercom should not be used at any time, but certainly no other time than very limited comments during the ten minute Advisory. As there is seldom ever a need to use it except for emergencies, the "Do not open until Xmas" sign is a good way to put this policy into effect. Further, there is little need for a daily bulletin; a weekly or on a need basis is usually ample, and then it should be held to a half page. Both the intercom and bulletin goals can be attained if students communicate with their advisor each day. Messages for individuals and small groups of students should be sent to their advisor, not advertised through a bulletin. Notices about new experience offerings can be announced on team bulletin boards or other such arrangements.

Responsibility and involvement are the keys here. The advisor should stress the importance of being in school during Advisory and should see that the ten minutes are profitably spent. The students won't come unless they are required, if all that happens is the taking of attendance. Advisory should not be required as being contrary to general philosophy. Some students need to sleep late; others may have out of the building programs early in the morning; others may have no group classes scheduled and would rather spend the time at home doing independent study. They are not required to stay until 3:15 p.m.; therefore, they should not be required to be in school at 8:45 a.m.

However, advisors should make it clear to their advisees that attendance is important in terms of state aid; even more important, hopefully school each day will be of value. Therefore, whether they come to Advisory or arrive later, they must understand why they are asked to check in with their advisor who hopefully communicates well enough with his or her advisees that they will want to visit with the adult they have selected; remember, over 80 per cent of the students usually get their first or second choice of advisor. For those students who never report in for attendance or communication, the advisor must seek them out for a conference. It ruins the financial reimbursements and raises questions about the advisor-student relationship. Schools still do have to face partial realities regarding state aid. If the student does not report in by noon, in many states attendance cannot be claimed. The students and staff must understand that yearly the school receives, depending upon the state, perhaps \$390 for high school students and \$260 for elementary students. Though this is not the major criteria for measuring success, schools do need enrollment figures and money if they are to stay open under existing state regulations; each individual must understand that there are two major reasons for one attendance check per day--state aid, and all school or one-to-one communication.

GROUP NAMING: Generally speaking, schools should not use the labels 2nd grade or 10th grade. There is no such person in the program, nor is there any content that relates to such a name. Further, substitutes such as graduation year--76's, 80's, 72's--are merely stop-gap efforts. They are almost as out of step as the "2nd grade." Further, every effort should be made not to use the words special education or early childhood.

The program calls for work with individuals. Therefore, usually there is no reason for group names to be applied randomly such as 2nd grade or 78's. Instead the discussion should be about Sally or Billy. However, there are a few external and rarely, but possible, internal situations which demand a label. In almost every case, these have nothing to do with the program. But there are times when, because of the "outside society," grade level names will be necessary. One example used before is that of the state aid census cards. Another time involves high school athletic teams. Occasionally, the Gray-Y will want to send information to the "5th and 6th grades." The research comparative studies with other districts now and then demand "3rd graders."

Therefore, advisors should explain to their advisees that they need to know that, if they transferred to a traditional school, they would be in the 7th grade. Further explanation is needed that sometimes there will be a call for 7th graders as a class, but these are only for reasons related to living in the community. Regarding the school program, these terms should not be used by students and teachers--not for scheduling, identification of subject content progress (there is no 6th grade science curricula), or other such requests or discussions.

School persons must learn to talk about individuals. Remember the traditional "academic" achievement spread of 7th graders is grade 3 through grade 13. The physiological age spread of the chronological ages of boys 9-12 is age 7 through age 15. How can we pretend we need all 7th graders for English or all 5th graders for softball?

The course groupings for which students register are usually based on interest and/or need, and in almost all cases are automatically nongraded as we break down scope and sequence syndromes. For example, for what "grade level" is the Indian Cultures experience designed? Use of names such as Instrumental Ensemble (which is already nongraded), Astrology, Zen A, Zen B, Fractions, Vikings, or whatever to identify groups of students who may need to meet together from time to time for discussion or instruction, but have no relationship to grade levels, is certainly within the philosophy.

If none of the above work, for a given situation, at a given time, terminology can be developed for the particular group involved. If it is really important that a similar age level of students meet, perhaps because that general group seems to desire common sessions, then age classification can be used--all the students who closely fit the 11-12 year old title can be requested as 11-12 year olds, not 6th and 7th graders. It is necessary to put theory into practice. Work with individuals; work with non-graded groups; work with age mixtures. When graded groups are needed for some very specific purpose, use the 9th grade level tag, but use it sparingly. How can we truly individualize if we continue to call for the 77's for class day after day? Once in a while, yes. Consistently, no.

ASSEMBLIES AND LARGE GROUPS: Assemblies and large groups should be kept to a minimum, but there are good reasons for having them from time to time. A film on pollution of lakes in the United States should be of interest to almost all citizens and could be shown in a large group. The police captain speaking on drugs could be another type of large group appropriate for almost all to hear. Assemblies relating to college could be of interest to a wide variety of age levels, not just "12th graders." The Wizard of Oz type of performance is another example of the large group common thread class or assembly, as would be the announcement of new school policies, or motivational or inspirational assemblies.

Large groups related to class work can be scheduled by including the name(s) of the course(s). Large groups open to all can be labeled by the title or topic; assemblies can thus be labeled, too.

When it is desirable or necessary to limit the assembly--the entire student body is desired but there is a need for split assemblies for lack of seating, or for appropriate presentation of topics--the assemblies should be labeled overlapping and suggestive. Thus, an assembly on drugs could be labeled Drugs 10's-19's and the other, Drugs 3's-12's. The overlap leaves the flexible choice up to the student. It means that the student can choose to go to either one, but tells that the presentation in the 10-19 assembly will generally be in language aimed at older students and the 3-12 to the younger. It also does not force a magic cut off, but tells the 9-10-11-12-13's, for example, that they can attend whichever they prefer. However, they should also understand that generally the drug conference for 3's to perhaps 12's and then 12's to 19's is the way the speaker has probably organized his vocabulary, but remembering that some 11's are 14 in the knowledge of drugs and some 14's are only 11, and thus could attend whichever sessions would be appropriate to their level of interest, knowledge, and maturity in the area of drugs. An 11-year-old might attend the younger session on drugs, but the older assembly on Indians.

Related to groupings, generally I.Q.'s should not be considered. Research indicates that there are now about 50 known I.Q.'s for each individual and that probably the total will rise to as many as 120. All the old I.Q. did was confuse and label, though it is generally true that all other things being equal, the student under the old system with an 140 I.Q. could do far better work in the basal reader than the student with a 90. However, with technology, drugs, and environmental changes, researchers indicate that the United States probably now has the scientific capacity to give everyone a minimum traditional I.Q. of 130. Further, studies show that a student in math may have a low I.Q. in abstract reasoning but an adequate one in the numerical and computing areas. Biochemistry has proven to be the greatest support of individualization. We are all different physically--we know that--and the research is now being applied to intellectual and emotional development. Therefore, seldom should student assemblies or large or small groupings consider the old I.Q. formula.

VISITATION POLICIES: The letter below could be an indication to the staff of present plans for visitors for a given year, as well as informative for guests. Though visitations are a tremendous burden, outstanding innovative schools are swamped. Thus the staff should see this as a compliment to the program, as an opportunity for an exchange of ideas from other school districts, for outsiders evaluative type comments, and for a chance to disseminate innovations or good programs. However, too many visitors mean there is no time to develop new programs or work with individual students. Therefore, there must be an effort to control the numbers. Comments and suggestions as to visitation policies should be welcomed, as should help with and for the student guides and special guests who might be with the school several days.

A type of letter sent to visitors is presented here for illustrative purposes.

Dear Visitors:

The school will be pleased to have you visit on _____
(Day) (Date)

In order to coordinate the day, we must request that you be here by 9:00 a.m. so that we can gather all the visiting groups together by 9:15. We realize this means that some of you coming from a distance must be up with the robins--or polar bears. We are sorry if this inconveniences you. When you arrive, please report

to the Planning Center where you can register and leave your coats. If you arrive early, coffee is available in the snack bar. At 9:15 you should be in Room 7 for a 30-minute orientation. From 9:45 to 10:30 student guides will take you on a tour of the building and program. From 10:30 until 3:00, you are generally left completely on your own, to visit those areas which most interest you, to talk with the students, and to interact with the faculty. We encourage you to make several trips around the building during these hours as the program changes so often you may miss an important part of it if you stay in one spot or make only one tour. If any group would like to have a question-answer evaluation period before you leave, please let us know when you arrive so that we can arrange a session for 2:30 or 3:00 p.m.

Unless special arrangements have been made, we expect that you will be here all day, as we find an hour or two hour visit or even a half day just leaves many "outsiders" confused. After your first visit here, you are welcome to come again even for short periods, but still by appointment. Further, we generally restrict visits to Tuesday and Thursday with occasional out-of-state okays for Friday and/or Monday to utilize weekend travel time. We try to avoid any visitors on Wednesdays and preferably not on Mondays and Fridays as we have found that we cannot find time to improve the program if we are constantly engaged in visitations. We are sorry to be so inflexible--it does not seem to fit with a school that advertises itself as flexible--but we have found that until visitors understand the program, an orientation period is essential. We do not have extra staff assigned for visitation so that it is almost impossible to handle one group at 9:00, another at 9:20, another at 9:45, and another at 10:15, throughout five days of the week. We have tried just letting people drop in and wander through the building, but this has caused many public relations problems. We usually have more than 500 visitors a month, and unless there has been some formal orientation the first time, we have been unable to date to provide a satisfactory experience. Perhaps with growing technology we will be able to provide more flexibility.

On days we have small groups, you may purchase the usual school hot lunch sometime between 11 and 1 for 50¢. On the other hand, the facilities are not great; you may prefer to eat at other hours from the snack bar, as food service is available all day, or you might wish to eat lunch downtown, or skip lunch. In case this is your first trip, we have enclosed a map of town to help you find the building. You may park anywhere on the streets around school except in the yellow zones. Please be sure each member of your group receives the information in this letter. If we do not hear from you, we will assume that you will be here on the above date. If for some reason you are unable to come, please let us know so that someone else wishing to visit may use this time. We look forward to seeing you and hope you enjoy your visit to the school.

PARENT COMMUNICATION: One of the problems which innovative schools always have is how to inform parents of the changes, and how to get them to understand the new efforts. The usual large and small group and individual parent conferences should be continued, as well as newsletters and open house policies for visitations. One way to keep them informed of philosophies, policies, and programs is to send home whenever the time seems relevant a communique related to the topic at hand. Below is a type of sample that could be sent home to reconfirm and reinforce programs underway. If students and parents really understand the philosophy, there is usually still some opposition, but not a revolt. It is when they do not understand well enough to at least accept the possible risk that the school is in trouble. One such effort related to experience selection is presented here.

To: Parents and Students

Attached is a sheet for students to indicate what experiences or "courses" they wish to participate in and with what consultants they prefer to study at the present time. Theoretically, we should not be signing up for classes or making any abrupt changes at the moment, as with the 12 month concept, students should just continue at their own pace and, as they complete various goals and experiences, they should begin new ones at the moment that is most appropriate. However, we are still handicapped by the fact that teacher contracts are on the nine month and summer session system. This means we have new staff for the students to work with as well as returning teachers. In addition, we have new transfer students attending for the first time along with students who are returning after a three-month vacation. Remember that students can continue the same program they had in June or August before vacation interrupted and often with the same instructor; thus many students will register for exactly what they have been doing; as we move toward a true 12 month school, we will not "reregister" each year. Being realistic, however, we are taking the first week for group orientation followed by a course enrollment period. Before registration occurs for the coming year, we believe it will be to the benefit of both student and parent to read the reconfirmation of the school philosophy regarding requirements as presented below.

1. There are no required courses for any age level or for graduation. The responsibility for the decision as to what area to study rests with the student and parent. The school will offer counsel wherever it is desired, but we do not know what is the best combination for every student. Therefore, students should consult their parents regarding their choices, as parents must sign the registration form. Students should then consult with their advisors, as the advisor must sign the form; finally the students must consult with themselves, as they must confirm the selection. The school does reserve the right to require a student to participate in an experience if we feel it is in the best interest of the student, but we try not to use this authority.
2. We believe in a balanced diet. We prefer that all students take some art, music, industrial arts, home economics, physical education, theatre arts, math, science, English, social studies, environmental studies, and other such studies. Furthermore, we feel that these should be interrelated as much as possible. Knowledge is not segmented. Therefore, an interrelated art, music, and literature program under a humanities approach makes more sense than to take a separate course in music, one in art, and one in literature. Trying to take 14 different subjects at one time is rather difficult. By interrelating there is much more opportunity, but if a student sticks to the traditional subject areas, rather than take all 14 at once, we prefer 5-7 at a time, changing studies several times during the school years so that the student would eventually become involved in all the areas. The research is quite clear that students learn best those things that are relevant and meaningful at this moment in time. The drop in, drop out philosophy is encouraged in all areas for students who just want periodic experiences without the pressure of registering.
3. For younger children, self-image, success, and peer relationships are much more important than reading and math. When the affective and psychomotor areas are in good shape, students seldom have difficulty with the knowledge, content, and skill areas in reading, math, and science. Not all the "first grade" children should take reading and math every day, and some should not take it at all, while others should have heavy doses. The child needs individual diagnosis and prescription for learning such as the M.D. completes related to health problems.

4. At the high school level we award a regular state diploma if the students generally spend four years here progressing in the experiences they have chosen. They can leave in less than four years or stay more than four years by arrangement. However, though the state requirements and those of most colleges are wrong, and we have the evidence of this, parents and students should be forewarned in case of transfer that most high schools require four years of English, three years of social studies, two years of physical education, one year of math, one year of science, and seven elective courses. If there is any possibility of transfer, then it would be wise if students took these courses. If they stay here, they can select those which are relevant.

5. Entrance to college, vocational school, fine arts school, and other special institutions is governed by the individual school or college. Students should consult catalogs of the schools where they think they might be interested in attending. Many colleges now have an open enrollment policy; all that is needed is a high school diploma or its equivalent. However, some colleges still require certain courses for admission. As a general rule of thumb, most colleges want on the transcript three or four years of English, two or three years of social studies; two years of math; two years of science; two years of physical education; and preferably some foreign language. Therefore, in making decisions about the child's future, everyone should be aware that we believe home economics, art, music, business, and industrial arts are just as important as the requirements above; we would recommend that students take less English and some art or take interrelated courses where English and art can be combined. However, if families are worried about college admissions, the safe bet is to take the courses formerly thought to be most important--English, social studies, and math.

6. We have just completed a six-page statement about graduation requirements and philosophy. Students still confused about what to take can seek help from the school. We hope this statement makes it clear that we believe students should take some type of balance of all the subjects and that no one area is more important than another. However, many schools will follow the rigid and erroneous state requirements, and some colleges still do have very tight entrance procedures. Thus, in deciding what to take while here, parents should work with their students on an individual basis and urge involvement in all areas; but if they are at all concerned about what other schools require, they should consider the outline presented above.

SELECTING ADVISORS AND COURSES:

Students should be reminded that over 80 per cent will receive their first or second choice of advisors; only one or two per cent will be assigned their 5th choice, but as this is a possibility, students should be urged to select their 5th choice as carefully as their first. Experiences may be selected with no restrictions other than those imposed by the adults.

Attached are the instructions as to the mechanics for the experience and advisor selection process. If there are any problems with the procedures, please communicate with the planning center.

Packets of material for students to use in selecting their courses have been placed in the teachers' mailboxes this afternoon. Please distribute these materials to the students during the Friday morning Advisory. If there are any students who are absent when the materials are passed out, make sure they too

receive the necessary materials. Instruct the students to return the registration cards to their new Advisory on the following Friday.

The temporary advisors should alert the students in their Advisory on Friday morning that we will ask all students to select their permanent advisors during Advisory on Monday. It is very important that they all be present at that time so that we can complete the task as quickly as possible. Attached are specimen copies of the Choice of Advisors sheet which will be used on Monday. Please post these so that students will know which staff members are available for them to choose.

We will provide each Advisory with a supply of Choice of Advisor sheets tomorrow (Friday). Please turn in to the Planning Center the completed sheets as soon as Advisory has ended on Monday. We would like to begin tabulating the results and making the final advisor assignments. Barring some unforeseen problems, we hope to have the permanent choices posted and distributed by Thursday afternoon. This means then that students will report to their newly assigned advisors at 8:45 a.m. Friday.

When students report to Advisory next Friday morning, they will bring with them their registration card. We ask that each advisor meet with each advisee at some time on Thursday or Friday to discuss the courses they have selected. After discussion of their registration, keep the pink copy for the advisor file, but turn in the white copy to the Planning Center so that we may compile master lists. We would appreciate it if the signed copies were turned in no later than Monday following their assignment.

We will be contacting each advisor this Monday and Tuesday to present those lists of students who have requested the adult as an advisor. We feel it is in the best interest of both the student and the adult if the advisor is consulted before final assignments are made.

CHOICE OF ADVISOR

Student's Name

Instructions: From the list of adults below, choose the person you would like as your advisor. Place the number 1 before your first choice, the number 2 before your second choice, etc. You should give us 5 choices.

- | | | |
|------------------------|--------------------------|------------------------|
| ____ 1. Mr. Barker | ____ 16. Mrs. Doescher | ____ 31. Mr. Knedel |
| ____ 2. Mrs. Barker | ____ 17. Mr. Ellingson | ____ 32. Mrs. Knight |
| ____ 3. Mr. Barkhurst | ____ 18. Mrs. Erdal | ____ 33. Mrs. Lawson |
| ____ 4. Mrs. Bayless | ____ 19. Mr. Erikson | ____ 34. Mrs. Matthees |
| ____ 5. Mr. Beebe | ____ 20. Miss Gabrielson | ____ 35. Mrs. Palmer |
| ____ 6. Mr. Biewen | ____ 21. Mr. Harder | ____ 36. Miss Petersen |
| ____ 7. Mr. Bjorgum | ____ 22. Mr. Herke | ____ 37. Miss Russ |
| ____ 8. Mrs. Bonniwell | ____ 23. Mr. Holden | ____ 38. Mrs. Schmidt |
| ____ 9. Mr. Bothof | ____ 24. Mrs. Holmes | ____ 39. Miss Schommer |
| ____ 10. Mr. Broughten | ____ 25. Mr. Jeffrey | ____ 40. Mr. Schuck |
| ____ 11. Mr. Bull | ____ 26. Dr. Jekel | ____ 41. Mr. Sorensen |
| ____ 12. Mr. Butler | ____ 27. Miss Jensen | ____ 42. Mr. Tartaglia |
| ____ 13. Mrs. Chinburg | ____ 28. Mr. Jensen | ____ 43. Mr. Ulwelling |
| ____ 14. Miss Courts | ____ 29. Mrs. Jondahl | ____ 44. Mr. Wolthuis |
| ____ 15. Dr. Darling | ____ 30. Dr. Kline | ____ 45. Miss Zeilke |

A short study of a typical student selected advisor system is presented here as further explanation of how the nuts and bolts mechanical conflicts are corrected, as well as further evidence of the value of even simple inhouse evaluation as was suggested in Chapter 20.

1. Rationale: Students at this school are confronted with freedom and flexibility unknown to most students in the United States. Because these students must continually make decisions concerning their educational program, the advisor system has been devised to offer assistance to each student in meeting any aspect of their individualized program. Under the advisor system, students select a teacher who they feel can give them guidance or assistance in planning and operating the educational program they have proposed. In reality, the advisor may only be a person the student can use as a sounding board or as a friend to talk with in time of need. Regardless of how the advisor-student relationship is used, it is a primary key to the success of a program in terms of the individual student.

2. Objectives for this year: To devise an advisor selection system which will:

- (1) Give the students at least two weeks to become familiar with the faculty before choosing advisors.
- (2) Assign not more than 12 students to an advisor.
- (3) Assign at least 75% of the students their first or second choice of advisors.
- (4) Assign all students to one of the five advisors they had chosen.
- (5) Assign at least two students of the same sex to an advisory group.
- (6) Allow any student or advisor to ask for a new assignment if justified reasons are given to the advisor coordinator.
- (7) Identify the primary factors for students selecting a teacher as their first choice advisor.
- (8) Provide information at certain intervals concerning the effectiveness of the advisor assignments made.

3. Procedure: (1) The faculty was consulted concerning how they would like the advisor system handled for the school year. They recommended that no advisor be given more than 12 advisees. (2) The faculty were then given instructions concerning advisor selection. (3) During the first weeks of school, each student was assigned a temporary advisor for initial guidance. (4) On Friday of the second week of school, students were able to see a list of the 46 advisors they might select the following Monday. (5) On Monday of the third week of school, students were directed to choose five faculty members they would like as advisors. The students were to indicate their first choice with a 1; their fifth choice with a 5. (6) Immediately after choosing their advisors, the students completed a survey revealing the factors most important in choosing their first choice advisor. (7) The advisor selection sheets and the sheets pertaining to factors in selecting advisors were returned to the office on Monday morning. (8) All five choices of advisors by students were then tallied on individual sheets designated by each teacher's name. (9) After all tallies were completed, assignment of students to advisors were made in the following manner: (a) Teachers receiving the fewest choices in all five selection columns were assigned these students. (b) Students who needed special guidance were assigned to their first or second choice advisor. (c) Teachers were then assigned the remaining students who chose them as a first choice. Once a teacher had received 12 advisees, his list was temporarily frozen. (d) The remaining unassigned students were examined carefully in terms of their five choices. It was necessary at this point to assign these students to their second, third, fourth, and fifth choices--depending on how many students had already been assigned to these advisors. (e) Once all assignments had been made, each list of students was carefully examined in terms of misfits by sex or personality conflicts. Some changes were necessary at this point. (10) Then the lists of students assigned to each advisor were taken individually to that advisor for

confirmation. Two advisors asked for changes to be made, and the changes were mutually acceptable. (11) After these changes were made, the lists of advisees were again studied and modified where deemed necessary. (12) Three students asked for a change of advisor, and these changes were also approved. (13) Students will be periodically surveyed at random as to the relationship they have established with their advisor.

4. Results Concerning Objectives: (1) Students were given two weeks to become acquainted with the staff before selecting advisors. (2) Ten advisors were assigned more than 12 students; seven were assigned 13 students; two were assigned 14 students, and one was assigned 15 students. (3) 81% of the students received their first or second choice of advisors. (4) All students were assigned to one of the five advisors they had chosen. Ten per cent of the students received their third choice, 6.6% of the students received their fourth choice, and 2.4% of the students received their fifth choice. (5) None of the Advisories had just one boy or one girl assigned to the group. (6) Three students asked for a new advisor assignment. Two advisors asked for a change in the list of their advisees. (7) From the data returned, it would seem that the primary factors involved in choosing an advisor are (a) feeling at ease with the advisor and (b) the personality of the advisor. Factors such as parents suggesting the advisor, a teacher suggesting the advisor, age, sex, and knowing you wouldn't have this person for a teacher seemed to have little influence on most of the students. (8) A 20% random survey of students in traditional grades 1-12 was made concerning their attitudes toward the advisor system. The results of this survey are as follows: (a) 92.4% were satisfied with the 8:45-8:55 advisory session; 7.6% were uncertain. (b) 80.7% were able to meet with their advisor when the need arose; 11.7% were uncertain; 7.6% were unable to meet with their advisor when the need arose. (c) 88.6% felt at ease when talking with their advisor; 10% were uncertain; 1.2% were not at ease when talking with their advisor. (d) 79% felt their advisor was interested in them; 19.8% were uncertain; 1.2% felt their advisor was not interested in them. (e) 81.8% would like their advisor to know if they were having difficulties; 15.8% were uncertain; 2.4% would not like their advisor to know if they were having difficulties. (f) 88.3% felt they received help from their advisor when it was needed; 7.7% were uncertain; 3.7% felt they did not receive help from their advisor when it was needed. (g) 69.3% felt their advisor was interested in what they did after their advisor helped them; 26.9% were uncertain; 3.8% felt their advisor was not interested in what they did after their advisor helped them. (h) 44.2% felt their advisor knew what they were doing during the day; 38.2% were uncertain; 17.6% felt their advisor did not know what they were doing during the day. (i) 98.8% were satisfied with their present advisor; 1.2% were uncertain. (j) 18.7% suggested changes to be made. The only suggestion made more than once was that each advisory group should not have students who varied in age more than a few years.

5. Recommendations: (1) Students should be given a longer period of time before choosing their permanent advisor. Particular reference is made at this point in regard to new students and new teachers. The new student was especially at a disadvantage in trying to get to know all of the staff. At least two weeks is needed for these students to become barely familiar with the staff. Each team should plan a way to orientate the students to all members of the teams during the first week of school, either in the auditorium or in each team's center. (2) A temporary advisor should again be assigned at the beginning of the school year to help students through any initial confusion or difficulty. All regular staff members, M.A.T.'s and M.S.'s should be included in this temporary assignment. Returning students should be temporarily assigned to their former advisor,

if he or she is still employed. If these students should decide to retain their former advisor for the current year, such assignments should be given priority. This would lower the number of students to be assigned later and would lessen the administrative task of making final assignments. Lists of possible choices for advisors should be posted throughout the school for students to be studying for two weeks before they make their choice of advisor. (3) All students needing special guidance should be identified before the advisor selection process takes place and these students should be given their first choice. (4) Students needing special guidance should not be assigned to M.A.T. or M.S. interns unless it is absolutely necessary, since these interns are only available for one year. These students need to establish a stable advisory relationship which does not change each year. (5) Students who would be traditionally classified as seniors should be carefully assigned to advisors to avoid assigning too many to one advisor. Each advisor must write a detailed composite report for each senior assigned to him. If too many seniors were assigned to an advisor, the teacher may find it difficult to complete a quality composite on each senior. If possible, seniors should be assigned to returning staff members who should be able to offer a more comprehensive composite for each senior. (6) All new staff (including M.A.T. and M.S. interns) should possibly be given a lighter load than the returning staff. (7) The number of students to be assigned to each advisor should again be aimed at a maximum of 12. However, if an advisor feels he can work with a few more than this number, such an assignment should be allowed. Some advisors with poorly-functioning students may find five advisees a heavy load, while other advisors with 15 well-functioning advisees may feel at ease. (8) More than two days are needed for the administration to make advisor assignments once the advisor selection sheets have been collected. Preferably four or five days are needed to sift through advisor requests of students and to finally make proper assignments for all students. Additional secretarial help would also lessen the load considerably. (9) A problem exists where several advisors have only a few students choosing them and then perhaps as a fourth or fifth choice. If the student assignment load is to be somewhat equalized among advisors, some fourth and fifth choice students must be assigned. Perhaps an answer to this problem will develop as the situation is considered. The only possible way now envisioned is not to assign any students to such teachers. However, if this were done, the (somewhat) equalized advisee load concept would be shattered. (10) Confidentiality in regard to students choosing advisors should be maintained. However, an individual teacher should be informed in private as to which students chose him and for which of the five choices. Perhaps this information coupled with the results of the advisor selection factor survey will indicate ways in which the teacher might work more effectively with students. (11) Once the initial assignment of advisors has been made, the changes of advisor should be made with justified reasons by the use of the drop-add procedure. The advisor coordinator should be consulted before such a change is made. (12) All new students should be surveyed as to whether the relationship they have established with their advisor after six weeks warrants any modifications. (13) A great concern is centered around the younger children (6, 7, and 8 year olds) in the school system and the extreme importance placed on their choice of advisor. These younger children need careful guidance and perhaps merit a guarantee of first or second choice advisors. Further study, however, is needed before a definite conclusion can be made. (14) The possibility of involving the graduate college classes from educational administration in a project such as this should be explored. Potential administrators from these classes could benefit from the project and more time would be available for the school administration. However, students from college classes would have limited familiarity with the students. (15) Questions still unanswered are: (a) What role should student interns play in the advisor system? (b) Should small groups of

close friends be assigned to the same advisor? (c) Should we give more consideration to the number of advisees who need special guidance than to the total number of students assigned to an advisor? (d) Should a teacher who receives massive requests as an advisor be transferred to a school counselor role rather than remain in a teaching role?

Summary: There are many other similar topics which could be included. Innovators have not been very innovative in the nuts and bolts areas. Perhaps soon creative educators will attack these mundane but at the moment practical factors. Previously the energy has gone toward the creation of new programs more closely related to learning, but as the world of technology grows in education, perhaps some of the above can be handled through video tapes, computers, information retrieval systems, and other methods. The major message here is not to let these mechanical items become excuses or frustrations which prevent change in individual schools. There are solutions to the nuts and bolts problems; patience in these areas is among the needed virtues. A solution will be found, but as some studies have indicated, most changes take anywhere from one to five years to achieve to some degree of satisfaction.

Magic 69 Glossary

In this chapter is an annotated list of 69 elements of change, key words, revisions, cliches, concepts, ideas, or whatever term the reader chooses to use. The author has found these elements of change to be crucial; however, some educators have preferred to identify these elements into perhaps 6 or more broad areas, whereas others have separated them sometimes into as many as over 100 smaller units. The total number is not important but the philosophy expressed through them is crucial.

Part of Chapter 1 carried a discussion of Bill Alexander's comments on mini, midi, and maxi schools. If we accept the conventional schools of the 40's and the 50's as mini schools, then the 69 items listed in this chapter are certainly those concepts which were the very basic essential factors for incorporation into the midi schools of the 60's.

The glossary presented in this chapter is not to be considered as an all inclusive list, and certainly not as the picture of the school of the future. Many of the elements are now being questioned as to their value for the 70's. Certainly there will be many replacements, and probably more than replacements, additions for the futuristic schools. With the experiences of the 1960's now past history, the dreamers are really beginning to focus on the Schools of Tomorrow. It is expected that by 1975 there will be some exciting and fantastic new proposals to cause educators to reach for new heights in education for the 80's and 90's--an age when the physical schoolhouse will shrink in size and the community and world schoolhouse will expand through transportation and technological developments, with a whole new emphasis on humaneness.

Perhaps now, before listing the 69 changes used in the midi schools of the 60's, it is appropriate to briefly review the entire concept of change in education, in the total society, and in the lives of individuals; hopefully this summary might lead to the bibliography--a list of books full of challenging ideas which will push forward the creation of humane schools in the 70's.

Thus, if the general thesis of this book is correct--that schools must change, can be changed, and by a mechanism much more recognizable than previously admitted --then the question might be raised as to whether it is really necessary to follow a somewhat formalized change system. In the author's view, such a plan is necessary. The plus 60 elements of an innovative school of the 60's must be woven into a pattern. For example, it does seem necessary to first envision possible new programs; we then must challenge the present to see if the current effort needs revision; then a rationale must be developed, and fourth, a plan or blueprint needs to be designed. Next the organizational methods take over, and as a sixth step, the program or school is created. After creation comes evaluation, and then reflection.

Haven't educators always planned improvements? Haven't we continually had critics? What has happened recently to cause such a tremendous ferment of dissatisfaction with the present schools? Why are individuals and groups now advocating an entirely new approach to education?

Probably the best way to answer these and other questions would be to insert right here a chapter on Social Change in North America. But the bibliography which follows in Section D contains some tremendous books on this topic by individuals who are much more insightful in the areas of social analysis. Therefore, in reaching toward the glossary in this chapter, perhaps first a generalized summary of many of the concepts contained throughout the book might be a way of answering the reform coming in society, while perhaps opening an entire new round of thought on education's role in this reform. The suggestions which serve as guidelines for renovation should lead to serious reflection, and either confirm or reject the beliefs about change; somehow, there must be further revision, not only of the schools, but of the entire change process; there must develop a method to insure constant ongoing innovation in all districts.

One of the most striking facts is that in order to be successful in change and to truly develop a significantly different program, the schools must engage in massive retooling. Everything in the school is affected. Most schools have tried to make only a few changes at a time. But now we know that a dramatic amount of quantity as well as quality must be included in the effort. The extent of this quantity is further reflected by the extensive list of elements of change--notions which must currently be considered when changing a school, but as stated, ones which may not be the key factors in future educational programs.

One of the obvious cliches in the present society pointing to the need for educational reform is the rapid time table of change in all phases of American life. For example, if we try to put change on some type of historical continuum, only 10 years ago did man leave his cave; five years ago, writing was invented; two years ago, electricity was discovered; yesterday morning, the airplane was invented; last night the radio appeared; this morning we saw the first television; less than a minute ago, in this fantastic pace of change, the jet airplane appeared; and in the last second, we have come upon the world of manned space travel.

Another way of looking at this unbelievable rate of change in the North American society is to look at the geologists time table, where we learn that in the development of the earth and life, what man has experienced is only a fraction of what he is destined to experience. If we put life on a one year continuum, at the start of the year, on New Year's Day, the earth coalesces. On Independence Day we have rock solidification; on Thanksgiving Day, the first life appears; on December 31, at 10:00 p.m., the forebearers of man make their appearance; 42 seconds before midnight, the birth of Christ occurs; in the 7/100's of a second which just passed, scientists learned half of what they know. In the next 7/100's of a second, it is predicted that they will double all that they know. With this fantastic rate of change, education must change too.

The problem with education today is that most educators are still operating no better than a 1930 model. Though the 1930 automobile was good, most people would not care to drive it as their major car now. It might be fun for a novelty, but not as the basic mode of transportation. And yet, in the schools we still use the 1930 model as the pattern of operation. We need to dream; what would we do if we could start all over? What kind of a school would we develop with all the knowledge, with all the resources, and with all the money, time, talent, and research that we now have available? Would we still develop self-contained classrooms with egg crate facilities and halls and walls? Would we still develop a high school built around bells ringing and hall passes? Would we still insist on the same curricula and the same obsolete requirements now operational in most schools? Most educators say no; if we could start all over, we would develop a different educational program.

But the problem is, how do we change the existing schools now? Part of the answer is that we need some change agents. We need people who can clearly state why schools cannot continue to remain 1930 models. We must become somewhat frustrated. We must work a little harder. We must accept the fact that we must anticipate and participate in a tremendous era of revision in the American schools.

One of the reasons that we haven't improved faster and done a better job is that we really haven't had any basic clash of ideas in American education. Yes, we have had some individual philosophies that have varied. Certainly we have argued about the methods of teaching reading, but as one visits schools around the country, generally speaking, education is about the same in most states in America. We have come to accept a standard or status of a certain kind of school, and we have established certain criteria for this school.

There have been and are great individuals in education. Many of them have spent a lifetime devoted to providing better schools. There have been many efforts. But until the last few years, we have really lacked dynamic leadership on a nationwide scale. The individual speaking out has been lost in the wilderness. We have had few really worthwhile programs. Even though millions of students have survived the present system, how much better could their educational opportunities have been if change had occurred much earlier. What has been the impact of recent educational improvements? Have they reached the classroom level? What has happened to Sally and Henry each and every day? Because we have lacked a real clash of basic ideas and issues on a national scale, the schools have continued to hum along pretty much in the same old way.

Finally we have recognized a few leaders who have been able to muster some support; thus the change movement is growing; we are headed for some tremendous clashes of ideas. In fact, we have already begun; these clashes should be healthy for education. They are going to make educators reflect upon the present schools, reflect upon the challenge to change, and reflect upon all the new ideas that have been proposed. We must decide if these new innovations are really better, and if they are, we must decide how we can implement them rapidly in the changing national society.

In considering change, it is usually helpful to look briefly at past events. For example, when we look through the history of American education, we come upon such proposals as these: (1) to provide learning experiences which appeal to the natural interests of children--instead of fixed, unvarying content, (2) to permit children to plan their own learning experiences instead of accepting only adult chosen activities, (3) to vary instruction for individual children and groups instead of teaching the same content at the same pace to all, (4) to teach with the aim of promoting a better understanding of the relationships among subjects and to the home and community, and (5) to teach through a variety of learning experiences instead of a single textbook. Do these five statements really seem radical now? Do they appear to be statements that we cannot accept? Most all current educators probably would agree that these goals should form parts of the present programs; some schools have already implemented these ideas, and yet, these are statements basically taken from the platform of the progressive education association, back in the 1930's. Why does it take 30 or 40 or 50 years to recognize excellent ideas? Fortunately, educators are beginning to move at a more rapid pace.

We certainly must move at a different pace if we are going to solve the problems of the inner city, suburbia, exurbia, and the rural areas. When we consider that

in some regions of the country, 65 per cent of the people live on one per cent of the land, that in spite of a decreasing population overall in the inner city, the school population in that area has often increased by 50 per cent, and usually from the so-called "minority groups." When we consider the tremendous turnover in population in the inner city, when we consider that schools in the inner city are much more expensive to operate, when we consider that the first violinist in a major symphony orchestra could not teach violin in many districts because he doesn't have the proper education courses, when we consider we haven't learned how to involve the parents of the students in most schools, we suddenly learn we have what seems to be insurmountable problems to correct.

As we look at suburbia, what are we doing for the students who do not fit into the college prep curricula, which, unfortunately, most of the suburban schools still follow fairly rigidly. Now we have the new exurbia, where the people are leaving suburbia and moving beyond to set up different types of communities, hoping to escape both the problems of the inner city and suburbia. As we reach into rural America and see the problems of rural poverty, their current schools, and the general problems of sparsely populated communities, and then as we realize that 3 per cent of the population produces basically all of the needed agricultural commodities, we certainly recognize that we must do something to improve rural America; but even more pressing, what are we going to do to improve education for the vast majority of students who attend schools in the inner city, in suburbia, and in exurbia? Certainly, we have miles to go as we reflect upon the need for change in the United States today.

In considering the task of accomplishing the changes needed, we must have a different kind of leadership. We need superintendents and principals and teachers who are willing to break traditions. We need principals who will launch the ship without champagne. The original questions remain, however; how are we going to change the old buildings now in operation with all their conventional facilities, programs, and faculties? Can we build and develop new schools with different principals, different faculties, different programs, and different facilities?

We must have leadership who can envision a new kind of school; this leadership must create a new philosophical environment before change can be implemented. This leadership must plan flexible blueprints heading toward the 21st century; it must organize differently; it must see that programs are implemented more rapidly. This means a tremendous amount of in-service training. We can't continue with some of the crude subjective and objective evaluations that are still in vogue; we cannot rely on comparisons of group standards and obsolete I.Q.'s. The new leadership must give direction in all of these phases if we are to truly develop change in education.

Further, the new leadership must help to develop teaching strategies where there is a different learning climate. We don't want rainy classrooms, where teachers act as spoon-feeders and speakers to groups of 25-35 children. We want them to be in sunny climates where teachers are listeners, motivators, and consultants concerned about individuals. We want them to get help from the computer so they can diagnose, and prescribe, and offer better alternatives than we have in the past.

The new curricula must ask questions related to scope versus depth. Is it important that we cover history from the prehistoric monsters to the latest development in Vietnam? Is it more important to study in depth some rather important issues

in the development of man? Are we going to continue to treat all the 8th graders the same? Are we going to continue to have curricula that is even labeled 8th grade? Are we going to develop self-paced materials that emphasize critical thinking and process? Are we going to be concerned in the curricula about man's quest for values? The new kind of school is going to reflect the curriculum changes which are being suggested through the social change in the United States.

The patterns for instructing students in the school are certainly going to change; the organizations are going to be much more flexible. We are going to have things like flexible scheduling, flexible teaching, flexible learning, flexible grouping, flexible pacing, and flexible evaluation procedures. We are going to have teachers involved in planning together. We are going to develop the concept of student freedom and responsibility; the patterns by which we move students throughout the year are going to be radically different than in today's schools. Students will determine most of the decisions.

And as we have said, the facilities must change. No school should be built now with permanent halls or permanent interior walls. They ought to be completely flexible arrangements so that over the summer, or over the weekend, over night, or over any given year, very easily the walls, the ventilation, the fixtures, the lights, and all can be moved. We can't continue to lock people into school buildings 60 years hence; buildings must be much more flexible than they have been in the past. We need to take a look at the high rise schools where multiple occupancy may be practiced; on the bottom floors we will have shops, and above the shops parking areas, and above the parking areas housing areas, and on the very top of the high rise the school, with an inflatable dome for the gymnasium and artificial turf on the athletic fields, which are on top of the skyscraper.

We are developing tile with "hair," so that all schools will have acoustical flooring; they will all be acoustically dampened. We are no longer going to be arguing about whether carpeting or an equivalent substitute is appropriate. We are going to make more use of pre-fabricated walls, and systems such as the School Construction System Development type arrangement. We are going to build instant campuses and construct schools in 60 to 70 days. We are going to make more use of portable pools. Every child ought to have an opportunity, with the technology we have now, for swimming during school, if we decide this is a valuable program for boys and girls. We can no longer justify lack of these kinds of facilities in any of the school districts today. The new accomplishments in architecture and engineering are a tremendous asset. As we consider programs for the 21st century, we must reflect the need for an entirely different type of construction.

We now realize that change must become a continuous process, a rolling stone, a rocket to the moon, or whatever analogy we wish to make. We cannot any longer tolerate schools improving in spurts whenever a sputnik comes along, or a progressive education movement causes a little discomfort for a few years, or war time needs spell out certain deficiencies in the schools. Educational change is going to be a constant on-going process where we improve every day, every week, every year, making truly significant reforms. When the sputniks come along, we will not have to dramatically retool because we will already be in the process of retooling. Right now we are so badly in need of truly experimental schools, ones which are way out on the cutting edge of change.

This need indicates the possible adoption of massive improvements. We realize that perhaps these will not be appropriate in the late 70's or 80's, as we

continue to pursue new and better ways to educate the youths and adults of the society. However, at the present time, we do have directions and goals toward which we ought to be moving based upon current knowledge about boys and girls and educational programs.

There are many ways to attempt to indicate what some of these improvements might be. In this chapter we are classifying them in six categories: philosophy; instruction; learning; structure; technology; and reporting. There seem to be about 8-12 revisions in each of these six components which constitute a school.

Following now is a glossary, or list, or short statements about some of the revisions of the 60's. We should not quarrel over the wording, or whether or not the item is a "change"; each of these statements or notions or titles, in some way or another, whether they are combined with other ideas or treated as isolated notions, seems to have some role in the schools as we start the 70's. Hopefully, each staff will compile their own specific list for their particular school. Each faculty member, as part of the process of staff involvement, ought to develop his or her own individual list, and then compile it with the other staff members' and proceed then to hammer out a glossary of changes for that school. No staff should completely accept the list here; these are merely notions which perhaps constitute a change of direction in the schools, when properly implemented. They have been useful in clarifying thoughts as to the kind of school we ought to have now. If a school staff really does become significantly involved in the on-going process of improvement, this list should soon be outdated.

Component I -- PHILOSOPHY

The innovative schools have a carefully prepared statement of philosophy and purpose; the convictions expressed consider the following and other elements.

Element 1. The school is committed to the concept of HUMANENESS. Schools of the past have reduced the options and alternatives through rules, regulations, and requirements, and thus have become inhumane institutions. The new humane schools have increased the options, alternatives, responsibilities, and self-direction opportunities. Self-selection has become an accepted concept in individualization.

Element 2. The school is committed to ON-GOING INNOVATION. Significant improvement generally occurs when there is a deep philosophical commitment that schools must be better, and that often, better means developing significantly different designs. Change as a continuous progress thus must be institutionalized.

Element 3. The school is committed to INDIVIDUALIZING INSTRUCTION. No longer a cliché in college textbooks, it is now possible and desirable to individualize instruction. Materials and teacher training are the major hindrances. Each student should be working on activities designed for his individual needs, interests, and abilities. "Required for all" courses are basically eliminated; where required courses are demanded, assignments are individualized.

Element 4. The school is committed to CONTINUOUS PROGRESS. Students should work through materials without regard for the "chapter" others are studying. Through SELF-PACING, as soon as they complete one set of materials they move right on to the next without waiting for the class or a group test. The materials are often student developed, and the length of time spent on them are usually determined by the student in consultation with the teacher.

Element 5. The school is committed to new ROLE PERCEPTIONS.

Teachers are seen as motivators and guides primarily working with small groups and individuals. They are no longer spoon-feeders of knowledge involved in large, group paced instruction or with classes of 25. They readily admit they do not always "know" what the adult of the late 20th and early 21st century must study.

Element 6. The school is committed to new TIME PRIORITIES.

All students do not need five 55-minute periods each week in high school for each subject, or 7½ hours of reading and language activities per week in the elementary. Individual time priorities are developed rather than group. "How much time does Sally need in a particular subject--not how much time does the first grade need."

Element 7. The school is committed to the concept of STUDENT RESPONSIBILITY.

Students should have at least a 50/50 relationship in making decisions about curriculum, policy, evaluation, new programs, and individual needs. Students accept responsibility when they have the right to share in the planning of school experiences. They learn that with freedom goes responsibility and courtesy.

Element 8. The school is committed to the concept of SELF-DIRECTION.

The different world of the 21st century will demand more than ever that individuals be self-directing and self-educating. They must be given opportunities to learn those skills through independent study and responsibility time, not hall passes and tardies.

Element 9. The school is committed to positive approaches to MOTIVATION and SUCCESS.

New approaches to motivation and incentive are replacing gold stars, report cards, grades, failure, and pressure. Comparisons of unequals creates false values. Marking a paper "two correct" is better than marking it "eight wrong." Each child should find some measure of success each and every school day. Involving the student in making decisions part of the day as to what he wants to do, rather than insist on teacher, school, or group requirements, is one way to help insure success.

Element 10. The school is committed to EXPERIMENTATION.

Most school methods are presently based on tradition, not extensive research or thoughtful philosophy (ex. bell ringing). Experimental efforts are adding insight; magic regulations such as kindergarten entrance dates are being replaced by more logical and rational approaches.

Element 11. The school is committed to becoming a COMMUNITY CENTER.

Schools must become community investments to the extent that they are open where needed, 24 hours a day, 7 days a week, 12 months a year. Closing schools at 4 p.m. weekdays, Saturdays and Sundays, and June to September does not make sense.

Element 12. The school is committed to becoming a SCHOOL IN THE COMMUNITY.

Students often learn best outside school walls. Smaller buildings should be constructed and more programs developed which find students working on farms, in automobile garages, in art museums, in business offices, and other centers in the community.

Element 13. The school is committed to a TWELVE MONTH PROGRAM.

Learning programs ought to be offered on a twelve month, self-paced basis where the learning objective is the criterion, not the hours in school or the month it was learned. As an easy way to start, students should only be required to be

there the state minimum number of days, such as 170 of the 365--minus the usual illness days--and should be able to take vacation in November or January, or March, or August or at any time it is needed, for as long as it is necessary or desirable. This is simple in a continuous progress school.

Component II -- INSTRUCTION

The innovative schools are involved in projects implementing current research findings, and are further researching new developments concerning instruction and learning; a few of the elements thought essential to explore now are listed below.

Element 1. The school is committed to exploring INTERACTION ANALYSIS. Research indicates that most classrooms are dominated by teacher talk and student quiet work assignments. Yet these methods do not appear as productive as self-directed study and student interaction, which is presently very limited. Interaction and other method studies are underway in concerned schools.

Element 2. The school is committed to HUMAN RELATIONS. Teacher and student perceptions of each other, teacher and student personalities, and the appropriate matches are crucial. The way adults perceive children appears to have a great deal to do with the way the child learns. Placing the child in contact with multiple personalities in team situations seems to enhance the possibility of the appropriate match of perception and personalities.

Element 3. The school is committed to developing skills of INDIVIDUAL DIAGNOSIS. Individual diagnosis of each child is absolutely essential if individualized instruction, continuous progress, and self-pacing methods are to be utilized. Some good diagnostic tests are emerging in the early childhood area, but much more objectivity is needed in determining needs, interests, and abilities. Students in school must be treated as patients in the medical office--each must be considered individually.

Element 4. The school is committed to INDIVIDUAL PRESCRIPTION. Interwoven with individual diagnosis is the necessity of individually prescribing programs for each individual. The schools must have a pharmacy of learning experiences. Matching curricula, requirements, choices, teacher personalities, and techniques with student personalities and learning styles is essential. A few schools are experimenting with computer decision making as an aide to providing alternatives. Other schools are developing subjective prescription sheets.

Element 5. The school is committed to writing LEARNING OBJECTIVES. The innovative schools have concluded that general goals and objectives such as to appreciate, to understand, to know, to enjoy are no longer adequate as measures of specific student behavior. Teachers and students are writing performance or behavioral objectives that are measurable in clearly identifiable terms for each learning activity. A person who ----- is a person who -----, or, given -----, the student is able to -----. However, behavioral objectives are not always necessary or desirable. In fact, more and more of the humane schools are moving toward agreements reached between the student and teacher, most of which are student developed, and often are best not written in a formula.

Element 6. The school is committed to applying new research regarding INTELLIGENCE.

Intelligence scores and readiness for learning can be affected. There are

probably about 120 distinct abilities for each individual, 50 of which are now known. The spread of abilities, characteristics, and achievements forces individualization of instruction. Innovative schools are exploring intelligence studies.

Element 7. The school is committed to aiding EARLY CHILDHOOD EDUCATION. Research on characteristics and achievement of students gives new perception to the importance of the early childhood years. Learning experiences must be structured to insure that the child's skills and functions are developed before undertaking "first grade" programs for which he is not ready. Entering kindergarten children, age 5, actually range from 3-8. Innovative elementary schools are starting new 3-6 year old programs, and secondary schools are supporting with staff and time.

Element 8. The school is committed to analyzing the APPROPRIATE DOMAIN. Investigation into the cognitive, affective, and psychomotor domains draws attention to the need to carefully consider the tasks being assigned. Students with learning problems often have difficulty in the affective and psychomotor domains, but educators are still predominantly prescribing work in the cognitive. Schools are experimenting with combination prescriptions in the three domains.

Element 9. The school is committed to PHASE TEACHING. There is no conclusive research to justify classes of 25-30 all day in each subject. The evidence now points to teaching in five phases in each subject--large group, small group, independent study, laboratory, and one-to-one conference as being superior to groups of 30. Innovative schools are piloting efforts to find appropriate time allotments for instruction. The answer varies with the individual, but there are some general percentages which can be used as guidelines.

Element 10. The school is committed to MULTI-MEDIA LEARNING. Learning seems to improve for most individuals when multi-media approaches are used: visuals, listening tapes, records, television, video tapes, graphs--see, hear, feel, taste, smell approaches. Though not a new idea, the innovative schools are increasing the use of these approaches and conducting studies to determine differences in achievement. The computer math projects where "first graders" are learning through "technological teachers" are examples.

Element 11. The school is committed to BUDGETING FEEDBACK. Budgets should provide funds for planning for change. Many of the present innovations can be handled by a re-deployment of present finances. Other new ideas need additional money. In addition to budgeting for planning change and for actually developing it, funds must be available for evaluative feedback as to whether the program is actually worth the money invested, in terms of time and achievement, and in comparison with previous programs or other new ones.

Element 12. The school is committed to HUMANE ACCOUNTABILITY. The accountability movement has many desirable features. Schools should know whether they are successful. However, the present accountability based on reading and math skills only is wrong. Humaneness calls for learning which hits affective and psychomotor development as well as cognitive, and at individual rather than group goals.

Component III -- LEARNING

The innovative schools are studying learning and learning theory and revising the entire curriculum as a result of recent research and experimentation.

Element 1. The school is committed to LEARNING ABOUT LEARNING.

Though there is still a great deal unknown about the way learning occurs, concerned schools are involved in extensive in-service sessions to increase staff knowledge of what is known. Teachers or specialists on the staff who understand learning psychology are being used as translators to help teachers build programs around how learning seems to occur for various individuals. The staff is fully aware of and involved in the many research projects attempting to learn more about learning.

Element 2. The school is committed to RELEVANT REQUIREMENTS.

There are very few things taught in a school which everyone must know. There are some things that most students probably should know, and other concepts, skills, or knowledges that some or a few should study. Perhaps 90 per cent of what is now being taught is not relevant for every individual in the society of 1980-2020, and almost that much is irrelevant for many individuals in the 70's. The innovative schools are attempting to solve the problem of curricular relevancy.

Element 3. The school is committed to PERSONALIZED PROGRAMS.

Each day, week, month, or year, depending upon the need, diagnostic discussions are held with and without the students to attempt to determine the best prescription for each child at that moment in time. It is thus assumed that a student may, for example, have two hours of individualized reading, 1½ hours of physical education, and one hour of responsibility time prescribed for a given day or longer, rather than the conventional hour each of English, history, math, science, physical education, and study. This means that such traditional courses as 7th grade English required of all are a thing of the past in the new kinds of schools.

Element 4. The school is committed to utilizing new CURRICULAR PROJECTS.

There are a great number of national curriculum projects attempting to develop better instructional materials in most subject areas. Almost all are better than the former basic and supplementary textbooks and therefore should be used; unfortunately most all are still written for group-paced instruction, and thus must be revised by teachers for continuous progress programs. Level four learners who develop their own objectives and media should not be forced to use any of the projects, regardless of how good they are, if the student approach is more meaningful to that individual. Students should be encouraged to write their own curricula as they find a need to learn.

Element 5. The school is committed to MULTI-DISCIPLINARY APPROACHES.

Though most new national curriculum projects are developed around the structure of a single discipline, the forward trend schools are emerging with an interdisciplinary approach, or at least a multi-disciplinary one. The innovative curriculum schools are merging the former fourteen separate subjects. Ultimately the materials will all be individualized so that they can be interrelated in almost any combination, or treated separately--ultimately one curricula, developed by an interrelated team of teachers and a student or students who select certain learning goals.

Element 6. The school is committed to ASSESSING INSTRUCTIONAL PACKETS.

Before accepting new curriculum materials, the innovative schools are using various criteria to determine which one, which ones, or which parts of which ones of the many curriculum packages available should be selected. Currently the items to consider the worth of a particular program are being listed by some evaluations under the following ten steps or criteria for decision making: problem, assessment, direction, availability, learning, content, environment, practical, decision, and action.

Element 7. The school is committed to CONCEPTS AND CREATIVITY. Specific content is not particularly important in most subjects today, but concepts and themes still are valid. Africa as content becomes rapidly irrelevant--Africa in 1940 and Africa in 1970; but it is of value as a tool for developing basic concepts such as modernization. Schools are actually working to learn how to "teach" creativity, long a goal but with little accomplishment. The present creative students have had heavy dropout rates in the conventional schools.

Element 8. The school is committed to PROCESS, INQUIRY and ANALYSIS. Knowing the process of how to find an answer, knowing how to inquire, to seek information, to discover answers, to analyze results--process, inquiry, discovery, and analysis are important approaches to learning. The good new curriculum projects and the good new schools are developing materials designed to develop these learning styles.

Element 9. The school is committed to MULTIPLE STUDENT RESOURCES. Students receiving "A's" and "D's" and spread ten years in achievement scores should not be expected to compete in the same curriculum. Neither should they be grouped by tracks. The exciting schools, realizing the extreme variance in learning frames of reference, have eliminated the required textbook and instead have substituted individualized materials aimed at a wide variety of abilities and interests, yet often focusing on the same themes or concepts.

Element 10. The school is committed to preparing SELF-INSTRUCTIONAL PACKETS. Self-instructional learning activities must be prepared by innovative teachers. They are not available in most areas commercially. Learning kits, Unipacs, contracts, learning activities packages, individually prescribed assignments, and capsules are being used; rigid curriculum guides are partly being replaced by flexible materials students can study without personal teacher instruction or teacher presence. However, these packets should only be used when they make sense to the particular teacher-student-content mix. Entire required for all courses built on contract or unipac approaches are as wrong as the single textbook. They only supplement the pharmacy--they do not serve as "the pharmacy."

Element 11. The school is committed to STUDENT QUEST. After any basic teacher required and prepared study has been completed by the student, and after he has perhaps pursued depth concepts suggested by the instructor, the student should be able to continue in the same topic which has been left open-ended by the instructor; he may decide to QUEST an entire course--never meeting in a formal class situation--a course not required. Students who QUEST generally develop their own objectives, content, and methodology, and prepare their own lesson plans.

Element 12. The school is committed to STUDENT EXCHANGE. Students learn more out of the school building in the environment conducive to the subject being studied; in learning a foreign language, for example, students should spend blocks of time in foreign countries, and foreign students should come to the United States--not just one or two, but entire classes and large groups. Depending upon community resources, students in as many subjects as possible should pursue part of the course outside the school building. Living on an Indian reservation for a period of time is generally superior to reading a book about Indians, but combinations of all media are probably best.

Element 13. The school is committed to GAMING and SIMULATION. These two notions by themselves are not that crucial; however, here they are

symbolic representatives of attempts to find new and better patterns of classroom instruction.

Element 14. The school is committed to SELF-SELECTION and WINDOW SHOPPING. Schools providing smorgasbord scheduling and optional attendance allow students to self-select the courses they want to study that day or year and the materials with which they prefer to work. This is practical on a K-12 basis, but is implemented a little differently at various levels of individual development. Window shopping eliminates the need for pre-registration and original drop/adds. Students search until they finally find the right program for a period of time--they then indicate what they have decided to pursue. They then register and do not change until they switch an entire area--from English to Industrial Arts. This is noted on the office records. If they take English 12 years, they never have to drop/add or re-register once the original sign-up has been completed.

Component IV -- STRUCTURE

The innovative schools are developing new staff patterns, new schedule arrangements, and new methods of interaction and relationships.

Element 1. The school is committed to DAILY SMORGASBORD SCHEDULING MENUS, or to NON-SCHEDULING.

Schedules should be built daily based on the instructional tasks planned by teams of teachers, and by student identified needs and individual choices. In this type of open schedule, about 20 per cent of the time is planned by the teacher. The other 80 per cent of the time the schedule is open to approximately 10-25 choices, depending upon the individual level of maturity. The best daily schedules find students self-selecting from a smorgasbord offering--the restaurant menu. There are now about seven methods to accomplish this, but each calls for a compromise; any of the seven are now considered improvements over period 1-2-3 type schedules or self-contained rooms. Dramatic breakthroughs should occur in scheduling in innovative schools in the 70's. Non-scheduling appears to be the next important step.

Element 2. The school is committed to NON-GRADING.

Approximately 15 per cent of the students presently achieve at their designated grade level. Achievement scores range from "3rd grade to 13th grade" for "typical 7th graders." Therefore, the organization must be a non-graded mix of students, and the materials individualized to provide appropriate opportunities for the "other 85 per cent" erroneously diagnosed under the graded system. The task of the teacher is to spread the range of achievement without creating competitive or caste systems. The old country schoolhouse was a great mix. K-12 schools, or overlapping "grade level" schools, have more to offer than K-6, 7-9, 10-12 artificial separations.

Element 3. The school is committed to TEAM TEACHING.

Two or more teachers, and their aide(s), planning and teaching together, maximizes teacher strengths, minimizes weaknesses; it provides multiple personalities for students, and improved perception for teachers. Teaming eliminates the concept of the self-contained room at all levels, K-12. It is an excellent way to interrelate curricula by teaming various disciplines and provides student choice as to personality, perception, age, sex, interest, and skill.

Element 4. The school is committed to TEAM PLANNING.

Team planning can occur in a variety of situations, but is essential in innovative

schools. The learning team can plan a daily schedule and program for a group of students; a multi-curriculum team can plan interdisciplinary approaches; a single curricular team can plan experiences in a particular subject field; a design team can plan for the overall development of the school program; team planning is absolutely essential to success in team teaching. Team planning is a way to begin teaming without actually doing team teaching. It avoids some teacher personality conflicts; in the actual teaching act, team planning without team teaching, while providing many of the values of the latter, does lose those gained by teaching together. In the long haul, team planning is more important than team teaching.

Element 5. The school is committed to TEAM LEARNING.
This is formalizing a carry over from the rural school--the concept of students teaching students. Many students learn parts of the curriculum better from their classmates than they do from the teacher; they learn by discussing concepts with their peers. Small group, quest, and lab experiences can all be structured to provide for planned team learning and tutoring.

Element 6. The school is committed to FLEXIBLE GROUPING.
Homogeneous, heterogeneous, sex, interest, and sociogram grouping are all wrong if used as permanent methods of organization; all are correct if used flexibly and alternated depending upon the instructional plans for the day; eventually flexible grouping leads to a pooling of individual students; from the pool generate teacher requests for students, student request for teachers, or individual choice options.

Element 7. The school is committed to the use of AUXILIARY PERSONNEL.
Use of para-professionals (teacher aides or other types of generally non-certified adults) is essential to the development of improved programs. Some serve in the role of an instructional assistant and actually teach; others fill clerical positions; still others serve in general supervisory positions (ex. playgrounds); some serve as special aides, persons who may serve as artists or audio visual technicians. Smaller schools often must combine these functions. If aides are not available as additional budget, the professional teacher ration should be changed so that the adult-student ratio can be increased by employing aides. In any case, the certified teachers with whom the aide will work should interview and recommend hiring of the aides.

Element 8. The school is committed to DIFFERENTIATED STAFFING.
The better school districts are moving to twelve month contracts and a shortening of the time actually spent in direct contact with children each day, to allow for team planning and curriculum development to occur during the school day and throughout the twelve month school year. Schools are staffed somewhat like hospitals: there are master teachers who diagnose and prescribe (doctors); there are staff teachers who carry out the prescription, but who are not qualified to perform some of the required tasks (nurses); there are para-professionals who relieve the professionals from tasks not requiring as much training (nurses aides); there are specialists such as automation technicians, psychologists, artists, and other (lab technicians and hospital specialists). There are candy-stripers who volunteer (parent or older student volunteers). Many of the above individuals are hired on a twelve month basis, but some will work fewer months of the year. This means teacher training must change; the innovative schools are now working with colleges on internship programs.

Element 9. The school is committed to INTERSCHOOL COOPERATION.
Smaller schools and smaller districts cannot individually provide all the services

and technological developments needed in today's schools; neither can they individually develop enough creative ideas to improve education rapidly; large districts, though possibly providing more services, also cannot keep abreast of all the innovations. But schools and school districts working together can; a confederation of schools and/or districts can share financial costs, technological development, specialized services, and innovative ideas in almost all situations.

Element 10. The school is committed to new DISTRICT PATTERNS.

New patterns of school district organization are merging to replace the unsatisfactory 6-3 or 8-4. Though no one knows the best system, if there is one, there is evidence the 6-3-3 is not the answer. Current trends lean toward the educational park concept K-12, at least implemented that way in program if not in facilities. Other systems, looking toward the middle school trend, are adopting a 4-4-4 pattern. Further, neighborhood attendance lines are finally being eliminated in favor of matching school philosophies with individual learning styles. The point here is that the innovative schools are searching for better arrangements than 6-3-3 with required neighborhood attendance lines. Many educators now believe a preK-14 is best.

Element 11. The school is committed to NEW ATTENDANCE LAWS.

It is more and more apparent that requiring all students ages 7 through 16, or whatever ages are picked by a state, to be in school every day, especially in a predetermined neighborhood school is not the best treatment of all students. Optional attendance policies, more flexibility in state laws and in selection of schools is necessary. The racial and bussing arguments have temporarily interrupted this reform, but it will come. Many 14-17 year olds do not belong in the present compulsive, inactive schools.

Component V -- TECHNOLOGY

The innovative schools are turning to automation and to new open learning facilities.

Element 1. The school is committed to huge STUDENT MEDIA CENTERS.

Innovative schools are developing exciting media centers to house 30-50 per cent of the student body for many individual activities. They replace libraries, which have always been underdeveloped, and study halls, which have had no other function than to police. These air-conditioned, carpeted, soft furniture learning centers have absolute quiet zones, semi-quiet browsing and study areas, and noise areas, in addition to housing the listening-viewing automation facilities for the school. Wet carrels and automated systems play an important role. Print and non-print mixes are now essential.

Element 2. The school is committed to TEACHER PLANNING CENTERS.

The new school plans call for teacher planning centers to replace the "classroom for each teacher" concept. In team planning there must be areas where teachers can easily communicate. These centers should have quiet individual work areas, group conference areas, individual conference areas, and relaxation areas. When possible they should be close to the media/resource center areas, and to the teaching pods.

Element 3. The school is committed to MODIFIED OPEN PODS.

Large open learning areas with arrangements for large and small groups, independent study, and individual laboratory experiences are replacing the classrooms designed for 25 or 30 students. Large open noise areas with no mousey quiet or extra noisy zones are wrong too. Where partitions are used, they are of the easily movable

type, rather than permanent construction, and usually demountable rather than folding. In the coming years, as programs and functions change, the form must readily change too. As construction occurs, it is only for the 70's, and therefore should be easily remodeled for the 80's. Form should support function. Completely open pods as constructed in some districts do not support all functions.

Element 4. The school is committed to ACOUSTICAL FLOORING.

The developments in carpeting have made mandatory the use of some type of acoustical flooring, which not only deadens sound, but provides a greatly improved aesthetic environment. In the past schools have often had acoustical ceilings and walls, but the greatest noise problems usually are from the floors.

Element 5. The school is committed to FLEXIBLE FURNISHINGS.

New developments in furnishings are finally allowing the gradual replacement of the traditional large, hard to move rigid student desk or table with more flexible seating possibilities. Schools should no longer order masses of the usual style desks and straight hard library tables and chairs. Both wet and dry carrels, soft furniture, carpet and other improve teaching arrangement possibilities. Birds and plants are important school furnishings too. All science laboratories, bookcases, and shelving, for example, should have plug-ins where needed and be on wheels for complete rearrangement as ideas develop and programs change.

Element 6. The school is committed to COMPUTER ASSISTED LEARNING.

The use of computers will dramatically change the role for teachers from imparters of information to resource stimulators for individuals and small groups. It will relieve teachers of clerical and repetitious drill and provide a tremendous aid to the individualization of instruction. Already some complete courses can be taught by a computer. The potential of these programs on a national hookup is just developing.

Element 7. The school is committed to RETRIEVAL SYSTEMS.

Closely allied with computers, immediate access to viewing and listening tapes within a school, retrieval of information from local and national sources, and finger tip availability to large group material on an individualized basis will further revolutionize the role of the teacher. Though CAI, CBI, and retrieval systems are extremely expensive, schools are now using them. The innovative schools are installing or making plans to install these systems, but ones which are flexible so that they can provide for individualized instruction, not mass media feedback to individuals of group required content.

Element 8. The school is committed to TELE-COMMUNICATION.

In spite of present limitations and disappointments, there is an exciting future for instructional and educational television. Tele-lecture and tele-writing systems now provide opportunities for resource persons and instruction to a degree of excellence never before possible in many small schools. In the 1990's students will have much of their learning at home, perhaps only attending the "schoolhouse" two days a week.

Element 9. The school is committed to an increase in AUTOMATION BUDGETS.

Micro-image, micro-transparencies, micro-fiche and other types of technological developments are going to continue to force change in education. Schools must reflect the need for these items by increasing the percentage of the budget spent in their development. While awaiting the more expensive pieces of equipment, the innovative school makes sure that teachers and students have plentiful access to tape recorders, overhead and loop film projectors, films, and huge amounts of

library type materials, including a flood of paperback and other short term resources. Video tape recorders offer perhaps the greatest immediate potential for all around, practical school use.

Component VI -- REPORTING

The innovative schools are developing new systems of student evaluation, program evaluation, and information reporting.

Element 1. The school is committed to INDIVIDUAL PROGRESS REPORTS. The group type comparative report cards have been replaced in innovative elementary and middle schools by diagnostic/prescriptive parent-team conferences, behavioral objectives measurements, individual diagnostic testing, and subjective analysis ratings. High schools are just beginning to modify their forms as they fight against college-based traditions and superstitions such as Carnegie units, G.P.A.'s, ABC report cards, and class rank. The individualized reports focus on the progress of the single student, and not on a subjective comparison with a group. The evaluation is determined in a 1-1 conference with the student and reviewed with the advisor.

Element 2. The school is committed to planned STUDENT CONFERENCES. The school provides time, through flexible team and schedule patterns for teachers to confer individually with students during the school day. These are planned as regular phases of the instructional program, not only in emergency or request situations. Great rewards seem to be occurring as a result of a 10-15 minute one-to-one conference each week or two, as opposed to no conference and five periods of 45 or 55 minute groups of 25 for instruction meetings. Evaluation conferences are especially helpful; but general "bull sessions" are also needed to open up lines of communication. Instructional tutoring conferences are an important phase too.

Element 3. The school is committed to INDIVIDUALLY PACED TESTING. Students should take tests that are as individually designed as possible. Innovative courses conducted on a continuous progress, self-paced basis allow each student to be evaluated whenever he is ready, not on some group schedule. Group testing of a diagnostic nature still has a place; group testing as a summary is valid, but the questions are general, such as "write all you know about your pursued area of independent study." Subjective group attitude surveys relating to student opinions are appropriate as informational devices, but the innovative schools have eliminated the practice of trying to test all students on chapter two at the same time. No one fails tests; they are merely means of evaluating how much a student knows about the subject being considered.

Element 4. The school is committed to COUNSELING COUNSELORS. Counselors are developing open counseling centers, becoming parts of teaching teams, giving large and small group instruction, writing unipacs, diagnosing and prescribing for individual students, and guiding students toward career oriented opportunities where students find success. Heavy emphasis is placed on the elementary school level, and the concern is with appropriate learning experiences for each individual, not dogmatic subjective requirements. Some counselors are becoming psychologists; their preparation should reflect this. But the exciting counselor is the OMBUDSMAN who wanders the halls like a pied piper, visiting with kids. Counselors are no longer glorified clerks who sit in a cubbyhole figuring out requirements and averages.

Element 5. The school is committed to TEACHER ADVISORS.

The ratio of 1-300 for school counselors does not work. Students select a teacher --an adult to talk to--who acts as the student's counselor-advisor. They provide that immediate contact. The "trained" counselor can then be used for special roles.

Element 6. The school is committed to INFORMATION FEEDBACK.

Innovative schools are making numerous changes. In many cases the actual measurable impact on the classroom has been rather negligible. Some critics are claiming that the changes are fad, not fundamental. The good experimental schools are now attempting to insure some measurement of what is happening to students as a result of all of the attempted innovations and research designs. This information must be accurately reported as feedback in the evaluation cycle. The good schools have statistical and interpretive analysis of the results of new programs.

Element 7. The school is committed to using EVALUATION MODELS.

In the attempt to gather information about programs and students, innovative schools are developing models to measure whether their programs are enabling them to meet their objectives. One currently in use is where context, input, process, and product evaluations are used as steps in an on-going and revolving cycle. Evaluation models must go far beyond what is now in vogue, and certainly encompass more than a "national assessment" concept.

Element 8. The school is committed to different PUBLIC INVOLVEMENT.

A new era of public relations has been opened by the demand to explain new innovations to the public. The best critics and ambassadors of the new programs are the students, and thus they must be involved first in the public relations plans. "Honest sessions," truly informing parents and students of the many present deficiencies in the schools, and the real successes or failures achieved with new programs, are important phases of public relations. One of the greatest boons is that of opening attendance areas. If parents are dissatisfied, they are permitted to transfer students. Much pressure on innovation has been released by such policies. The new schools are thus attempting to develop new public relations programs, and new types of PTA's, and other parent organizations. Parent volunteers are an important part of the innovative schools programs.

Element 9. The school is committed to INFORMATION ACTION.

Many schools gather information about their programs, but seldom use it to stimulate new developments. For example, we have known for years the current foreign language and physical education courses in the public schools were not reaching their stated objectives for the majority of individuals. The truly innovative schools are attempting to develop new curriculum materials, teaching methods, and other in areas where the resulting information feedback demanded action.

Element 10. The school is committed to CLIENT ORIENTED EVALUATION.

For years schools gave students A B C D F marks and set behavior standards. Students were not asked to do the same for the teachers. The innovative schools are developing procedures for student evaluation of teachers; not only are students selecting their own teachers, but they are marking rating scales to help identify strong and weak teacher characteristics. Teachers are rating teachers. No longer will the principal and superintendent determine teacher competency. Further, teachers are evaluating administrators. The whole process relates to client-oriented evaluation.

Thus ends the list of 69 suggestions for school improvement; more could be added; some of the above could be combined. But if schools can implement these 69, they will be off to a good start. More are coming in the 70's and 80's.

SECTION D

SUMMARIZING COMMENTARY WITH
DESCRIPTIONS AND BIBLIOGRAPHY

Chapter 23

The Reachable Star

President John F. Kennedy, speaking in 1963 about the signing of the treaty to end the testing of nuclear weapons in the atmosphere, said as part of that address: "But history and our own conscience will judge us harshly if we do not now make every effort to test our hope by action, and this is the place to begin. According to the ancient Chinese proverb, 'a journey of a thousand miles must begin with a single step.' My fellow American, let us take that first step."

That challenge of John Kennedy in many ways has been the theme of this entire book. Changing the schools of the United States is a journey of a thousand miles, but it will never occur unless some educators, some parents, and some students take that single step. A few have begun. But history should now record, that most schools, not just a few, at this moment in time, reaching the decade of the 70's, took that first step--the step toward the long overdue massive reform of American education.

The 1960's found a minority of schools making an effort through team teaching, nongrading, flexible scheduling, individualized instruction, carpeted buildings, and open pod designs. But these did not go far enough or fast enough, nor were they joined by the majority. They struggled against tremendous odds--lack of experience, untrained teachers, limited budgets, lack of parent understanding, and the failure of the educational world to support their pioneer efforts. But they did achieve the break-through that now makes it possible for educators throughout the nation during this decade of the 70's to show that with true commitment, hard work, cooperation, and student and parent support that we really can develop relevant and humane schools.

Those starting will take much abuse. Needed are sensitive but tough hides. A number of people from all walks of life have had dreams--have had great dreams--ones that we cannot give up. One of those dreams is that someday the young people in the United States can be part of the fulfillment of an educational dream.

In 1968, educators and parents said that it would be virtually impossible to create almost overnight the Wilson School in Mankato, Minnesota, described in Chapter 3. But it was successfully accomplished, using the same ideas, philosophies, gimmicks, and planning as has been described in the various chapters of this book. History can record that one school, as did others, during the years 1968-1970, took that first step; a significantly different school was successfully operating with the 69 elements of change listed in the glossary. To be sure, many of those 69 elements needed improvement or expansion in the day by day implementation efforts, but theory was put into practice and the notions did play viable roles in creating a more humane school.

Wilson, as an "innovative upside down school," may altogether cease to exist in the future. The legislature is now studying whether to close laboratory schools, though at the moment it appears that Wilson will survive because of its current efforts; the present college administration may leave; the director will certainly eventually depart, along with more than half of the staff. These people have already received job offers from throughout the United States. The school could

continue to become even a bolder, different, better humane school, or it could revert back to a more structured form, depending upon the persons who are involved in its future. Those who leave will help spread the word of change, will help create new Wilson schools, much further advanced than the present form, and will be instrumental in the complete revision of teacher education. Thus even if Wilson ceases or reverts, all the frustrations and efforts were of tremendous value for the state and nation and the further encouragement of educational reform in the 60's.

However, assuming the school remains open as a viable, change-oriented institution, visitors have asked what next? At the moment these "next plans" are in the formative stages, but several things seem apparent and several alternatives appear immediately open. One is that schools-within-a-school of various types could be formed. Even though the school is very open, as described in Chapter 3, it is not open enough for some students and teachers. Therefore, a possible step may be the identification of a unit where the adults and youngsters have no courses or enrollment, no teachers of "subjects," no pressures from home or school progress reports or daily schedules or any other school road blocks. These would just be adults and young people living together during the day with a "headquarters" within the present program where they could design their own inter-related learning with utilization of the building and the world as a community. Individual students and adults are now operating this way, but they are still hamstrung by some pressures of the existing system. They need an open-open maxi school design.

Some students perhaps need to stay in the present open program--it is working just fine for them, as they have all the options of doing what they want, but within an organizational structure which provides some guidance through teams, daily schedules, advisors, and progress conferences. Within this same midi school approach, some students may need more planning than they now receive, so it is possible that students may be given the option of following a "balanced requirements" approach where they can receive more help in determining what learning experiences best fit their current needs. During the switchover to self-direction, they could select "courses" more teacher designed within a broad requirement of experiences in all the various teams over a period of years. Additionally, the younger children may profit from a larger mini school as a home base, with movement into the midi or maxi school as individuals rather than as groups. This would allow more flexibility to truly meet individual needs.

Further, greater expansion of the school in the community and the lighted school concepts is a must. This may be accomplished through the vehicle of environmental studies, a pilot program of which is now underway. Additionally, greater staff allocation and priority in funding must go to support significant research and evaluation. As in most all school districts, even in those where these areas are included in planning and operation, they are still funded at indefensible levels.

But even bolder steps may occur within the next few months. For example, the fourteenth massive rearrangement of physical facilities in a thirty month period may see the entire media center, both print and non-print moving to the area now being used by the systems team; the communication team may move to the current print part of the library; Spanish and social studies may move to the non-print part of the current media area; the systems team may move to an area now partly occupied by the environmental team; and the expressive and creative teams may do some internal juggling to provide a two room more open awareness center, as well as a number of other minor changes. Or none of the above may occur, but instead

the present communication team may move into the media center and then purposely disintegrate.

More than physical rearrangement would be the elimination of the team structure such as the Creative Team, or the reduction of the five teams to three or four, leading toward an interrelated effort for the individual, and the elimination of teachers tied to a subject to teach or a named team. Adults would still work more in their areas of specialties, but would be free to help students learn whatever interested them. In other words, the old "art teacher" may "teach" a "course" in philosophy, or Spanish, or humanities; he may work with any other adults with any individual or groups of students who seek a meaningful relationship with topics and adults. Any adult or any youngster could teach. Adults become truly learners, consultants, motivators, participants, and guides, not presentors of knowledge. The physical changes suggested would move most all the staff together in combinations of physical space which could be used as takeoff points for whatever curriculum became relevant at that moment either within one room, several rooms, somewhere in the building, in the community, or anywhere in the world. The key to teacher teaming would be "splinter teams" without names, formed through content, interest, and personality matches. Learning experiences could still receive a "title" for reference and communication. How can we justify eliminating "10th grade," yet still hire "English teachers?" The schedule would be reduced to notices of special events or desirable communication about groups. The advantages of such a plan are tremendous; students and staff could be as open as necessary, yet any student who still wanted chemistry as chemistry could seek out a staff member who could help with chemistry. The continuum for increasing the provisions for individual differences grows longer and longer with each of these kinds of steps. Teams of adults and/or students would still meet, but on a need basis, not by artificial arrangements; students would be much more involved; parent education nights would continue to help get the pressure off the student so that the experiences really are student developed, not Dad's choice.

The problem of writing such a book as this one is that hopefully by the time this book reaches print, Chapter 3, titled "The Current Effort," will be a description of the "old Wilson." One of the major messages contained in this manuscript is that we must build in mechanisms for constant, ongoing significant change. The traditional schools have designed new facilities, written curriculum guides, and bought different books, but the general format has remained the same. The innovative schools have worked and worked over a three-year period to develop "a model," and then have, in the name of quality and stability, stopped being innovative. Wilson must show how schools can leap dramatically ahead in giant efforts. If continual significant retooling which provides significant improvement is not a built-in mechanism, the school should close--and the same should be true for all public school systems in the United States.

The important factor for the future, then is not rah, rah Wilson and its present faculty, nor its potential plans for improvement, as in a truly dynamic, ongoing change program, complete revisions of ideas are possible almost overnight. The important thing is that Wilson, during a three-year period, caused a dramatic impact on teacher education at Mankato State, on the community of Mankato, and on schools throughout Minnesota and the nation. Thousands of visitors came; two North Central Accreditation teams, looking at Mankato State, had the highest praise for Wilson as a model for change for the college and the nation; the staff went on consulting trips throughout the United States; articles written by the author were published in the August, 1970, Instructor magazine, the March, 1969, Kappan, and the November, 1970, Educational Leadership, among others. Outside

visitors have written about Wilson in a July, 1969, National Observer newspaper, in the March, 1970, Earth Science Curriculum Project Newsletter, in a 1969 issue of the Minneapolis Tribune newspaper, in the September, 1970, Examen (a Mexico City based journal of cultural and educational information), in many articles in the local town and college news releases, and in other national publications. Even with all this, the school is now planning major changes to move beyond the present stop-gap measures and build in a method to eliminate already obsolete programs.

Hopefully this will not appear as an egotistical effort to promote one school; it is not. The references are only included as evidence to support the view that what has been presented in this book is practical, and to further show that an ever increasing number of teachers, parents, and students are ready and anxious for dramatic reform. These mentioned articles are further intended as encouragement to those who have not yet taken that single step, or if they have, to urge them to travel farther along the journey of a thousand miles. Regardless of the future of Wilson, these three years of frustration and success have been rewarding and challenging, and only further prove that the efforts started by a handful of schools in the late 50's and early 60's, and increased in the late 60's are no longer more proposed panaceas which will be used for a while and then collapse into the pages of unsuccessful adventures, similar to the fates of many previous efforts to reform education. This time, the decade of the 70's and 80's will not only see dramatic change, but change that is relevant and humane.

Wilson School is already well in obsolescence in its present state. The next step is to revitalize the entire approach to education: adults as human beings, not as 4th grade or art teachers; truly interrelated concepts with the elimination of artificial teams, enrollments, and courses; students out in the community and the community into the school on a continuous extensive basis; a school so individualized and so personalized that schedules are not necessary; learning experiences that are really relevant growing out of sincere interests, and studies that are not merely self-paced camouflages of the old group scope and sequence of instruction; yet providing a method as an easy vehicle for the formation of groups whenever desired; students in a true partnership as adult-youngster, person-to-person, human relationships rather than the old teacher-pupil concept; the world as a school for learning and not just the stuffy subject centered buildings; instant technological assistance; a true understanding of freedom; cooperation rather than competition; communication related to learning growth without unnecessary pressure; and, and, and--this will hopefully be the Wilson of 1971 and 72, as well as a description of most of the schools of the nation, so that by 1975 we can really move into the world of the 80's and 90's--a world that will hopefully be significantly different.

The Wilson of Chapter 3 is far beyond most schools in moving toward these concepts--certainly further than the current conventional or flexible modular systems. Even though that school is now attempting further change to eliminate its own obsolescence, the kinds of suggestions made in Section B are still valid, as most school districts will be forced to undergo a transition period from where they are now to where they decide to step. The practical guidelines in that section should provide further incentive for creative educational engineers who are seeking mechanisms for changing the structural base; the suggestions should help these persons determine the best method for transforming their schools into relevant, humane environments.

Can the unreachable star of the impossible dream really become a reachable one? Some educators are satisfied with their present star. Some are not, but yet see no way to reach a higher one. But for those willing to try, that unreachable star is now within reach.

Dale Wasserman wrote the musical, Man of La Mancha, music by Mitch Leigh and lyrics by Joe Darion and published by the Sam Fox Company of New York. It is the lyrics of one song in that musical that provides the motivation to accept that the challenge of John F. Kennedy and the ancient Chinese proverb--to start that journey of a thousand miles. It is the combination of music and lyrics which provides the inspiration to dream the impossible dream, to reach the unreachable stars.

The words are presented at the end of this chapter as a summary philosophy to all that has been said in the pages of this book. If there still remains any doubt about the feasibility of such efforts, the extensive but far from exhaustive bibliography listed on the closing pages should provide additional reinforcement, inspiration, and challenge, as education for the 70's seeks to reach the unreachable stars. In the next few paragraphs two quoted outside viewpoints are given through articles about Wilson. Perhaps these can serve as a road map leading toward the challenge of the sometimes seemingly hopeless quest.

"Nothing is Too 'Far Out' to be Tried in the Wilson School"

By John Morton

The National Observer

At the Wilson School in Mankato, a high-school student spent the first two months of his junior year in the student center drinking pop, playing cards, and listening to rock music on the juke box.

He could have attended classes in science, English, and history just down the hall. But it is the policy of Wilson School not to force a student into anything. Indeed, he even has the option on a given day of not coming to school at all.

There is no dress code--some youngsters come to school barefoot--no report cards, and none of the traditional grouping into grades according to age. Students from 3 to 18 share the same building and some of the same classes. Individual programs of study are decided on by the students themselves; they also help design most of the courses. With attendance optional, a teacher who fails to attract students may be asked to look for work elsewhere.

'It's Different'--This may sound like student power and permissiveness run wild, but some of what occurs at Wilson School may be a harbinger of education's future. Run by Mankato State College as a laboratory school, Wilson probably is the most innovative publicly supported school in the country.

The man behind Wilson School is Donald E. Glines, one of the country's foremost apostles of educational innovation, who was hired a year ago with a few restraints. "I will not say Wilson School is better than a traditional one," says Dr. Glines. "I am just saying it is different. We are trying to find something better. We can do that only by trying something different."

Wilson School's reputation has grown and is sure to grow more during the coming year when teachers, school board members, and administrators from around the country are permitted to study it in large numbers for the first time.

There are other experimental schools, of course. Almost every state boasts at least a handful of public schools trying out new programs of some kind. The Nova School near Fort Lauderdale, Florida, for example, a pioneer in innovation, is ungraded from grades one through twelve and soon will open an elementary school housing 700 pupils in one room.

The Matzke School in a Houston suburb is using a building without interior walls for its team-teaching approach. Marshall High School in Portland, Oregon, uses a flexible schedule that includes classes of varying size, duration, and intensity. Schools in University City, Missouri, a St. Louis suburb, have variable daily schedules and give students considerable freedom and responsibility.

Most such schools, however, try from one to a half dozen new concepts; the Wilson School is trying to pull together all manner of innovations in one place. Ideas rollick around among administrators, faculty, and students so rapidly that no single month's education program is exactly like another's. The philosophical ground shifts so fast that a formal statement of it mimeographed in May was out of date by July.

The 600 students, drawn from Mankato families on a volunteer basis, don't enroll or register at Wilson--they "shop around" for three or four weeks to see which teachers and fields of study they like. The teachers will suggest programs they think the students might like, and the students add their own ideas.

If nothing the teacher suggests suits a particular student, something special will be worked out for him. A student also can devise with a teacher one or more of three or four weeks' duration "mini-courses" in a particular field, for example, minority rights or major themes of the poetry in rock songs.

"The teachers act as consultants, guides, motivators," says Dr. Glines. "They advise, they suggest, but they do not force unless it comes down to the same sort of situation a doctor faces when he has a patient who will die within the hour if he does not do something."

Even this final veto is not exercised during the high-school years. Dr. Glines is fond of saying that a high-school student at Wilson can take nothing but basket weaving, if he insists, and still graduate. But the youngster is kept advised of the limitations this kind of program will impose on employment or acceptance at college.

After four weeks of "shopping," a student is supposed to tell what he has decided to study.

A Time of Less Freedom--Students in lower grades have less freedom. Those in the preschool program and in what would be kindergarten and the first grade in a traditional graded school follow curriculums which teachers help decide, based on individual evaluation. These youngsters, however, still are turned loose to select courses on a daily basis and associate with older students.

Pupils decide on their own what they want to take; however, teachers reserve a veto power. A "second grader," for example, will be required to take remedial reading if he needs it, even if he does not want to. Similarly, if he lacks gross or fine motor development, he might be forced to take physical education or industrial arts. Offering industrial arts in primary grades is itself an innovation.

These younger students earn "responsibility hours" in which they can study on their own, visit other classes, go to the student center or just roam the halls. "In the school I use to go to you had to stay in one room all the time," confides Leo Bosard, a fourth grader, as if describing the deprivations of reform school. "Here you get to move around a lot and go different places."

To Dr. Glines and his staff, this mix and movement among young and old is an innovation that gives younger students someone to admire and promotes tolerance and helpfulness in the older ones.

A Generation Gap--Not all of the older students seem pleased, however. "There is too much of a generation gap," says Tammy Ollrich, a senior. And Bob Een, a junior, complains: "In their responsibility period they are supposed to be studying, but instead they are running up and down the halls, jumping on the furniture, playing cowboys and Indians--'Pow! Pow! Pow!'"

How well do students do at Wilson? The program is only a year old and the real measure will come as Wilson graduates attend college. Several already have taken college-level courses at Mankato State as part of their high-school work and have done well.

Some students, randomly sampled, say that once they became used to responsibility, they learned at least as well and probably better than they could have in a traditional school. None of them would welcome a return to a traditional system, citing the excitement and challenge of experimentation and freedom. "It works out about the same," says one. "Those who goof off here would goof off in a traditional school."

Mrs. Jo Lawson, an English teacher, had been fearful that the broad middle band of average students might suffer without the "push" of a traditional, structured program. "So I concentrated on them for a while," she says. "They just muddled along, about the way they would in a traditional system."

No One is Failing--The significant thing about Wilson Schools's students, says Dr. Glines, is that none of them is failing, only achieving educational goals at different speeds. "How can you fail a child in the third grade?" asks Dr. Glines. "It's incredible! The teacher has failed, not the child--99.9 percent of the problems are caused by the teachers and the schools."

Starting this summer, Wilson is operating on a 12-month school year. A student can decide to go to school in August, skip September, come back in October, or whichever other arrangement suits him and his parents. "What's so magic about going to school in January?" asks Dr. Glines. "Kids can learn just as well in August."

Having students drift in and out in this fashion would pose problems for traditionally operated schools. So would optional attendance, since a student could hardly keep up with a class marching forward together with regular attendance and allotments of study.

Such traditional classroom practices provoke a tone of disbelief in Dr. Glines' voice. "All over America you can walk into a classroom and see kids on the same page, working on the same problem, as if all 25 had the same abilities, same interests, and the same goals. Whenever a school claims it's paying attention to individual differences, it is usually hogwash."

Dr. Glines often compares the typical American public-school education to a hypothetical situation in which a physician prescribes flu shots for all 25 patients waiting in his office, even though they might suffer from heart disease, ulcers, and a variety of other afflictions.

He preaches flexibility, and Wilson School reflects his beliefs. Thus, erratic attendance of students poses no problems. Each student is permitted to progress at his own speed to the limit of his abilities and interest.

Each day's schedule is devised and posted the previous afternoon, which gives students a chance to think about what they want to do next. Seminars are common, but formal classroom situations are scheduled only when a teacher has a specific reason for wanting all of his students together. It happens rarely.

A student completes a course whenever the teacher and he agree that he has achieved the goal he has set for himself. This provides maximum flexibility--for the student who can finish a typical 36-week chemistry course in six weeks, as well as the one who needs 45 weeks. As for transferring credits and grades to colleges, almost all college-admissions counselors queried have agreed to accept the teachers' subjective evaluations of a student.

"The great majority of high-school students will complete their studies in four years," says Dr. Glines. "But there will be some who will do it in three and others who will take five."

As for the lad who spent the first two months of his junior year dealing cards, he soon was beset by nagging fears about never getting out of high school. So he began to study.

"I am still a quarter behind," he says, "but I am going to school this summer to catch up."

"Smorgasbord School"

By John F. Thompson

Earth Science Curriculum Project Newsletter

Would you believe a school without any attendance requirements? Where the students have total freedom to create their own curriculum as they will learn it? Would you believe teachers whose primary purpose it is to serve as resources for students and who issue no report cards or grades? ESCP staff members visited such a school in March and were excited by what they observed. The school is Wilson Campus School, at Mankato State College, Mankato, Minnesota. The principal of this school is Dr. Don E. Glines, who often lists himself as "vice president for heresy," rather than as principal.

The school started with its present philosophy in September 1968 when Glines tore up the standard schedule and decreed that the school would become innovative and creative or close its doors. Some of the staff were not ready for the drastic change, but most of the students were. Instead of taking a few innovations and implementing them gradually over several years, Glines implemented 69 innovations at one time. In reflecting on the experience, he feels that doing all of these things at once was easier and more effective in the long run than working piece-meal at change. This is not to say that growing pains were not felt in all quarters but as the school progresses toward the end of its second year, the program is functioning very well.

The Wilson School includes 550 pre-school through twelfth grade students and has a faculty of 33. The students have not been pre-selected and include young people of all abilities and handicaps--among them, children previously in special education classes. Twenty-eight percent of the students are faculty children, and the rest are from the local community. Wilson operates on a 12-month basis.

A schedule for the school is made up daily. Students may request special mini-courses or special help sessions, teachers may offer special lectures on events, or the room and teacher may just be open all day for an activity without pre-determined structure. Several students requested a mini-course in electronics, for example, so one is being given. One teacher decided to put on a play and advertised for students who might be interested. He expected a few senior high students to appear and was surprised when many elementary students came also. All will be included in the production. Several students asked to go to Chicago to see Hair. They were told that, if they could raise the money, they could go. They did and they went. When they returned, they put on an adaption of the play for the rest of the school.

Another group wanted to go to Mexico to study Spanish and Mexican culture. Again, the students raised the necessary money and went for six weeks of study there. A bus load of Mexican students will be at Wilson in April for an exchange of learning and cultural experiences.

A computer terminal is in constant use by students from "third grade" up. High school students, in addition to the many options available at Wilson, have access to the entire community and college campus. Many are working on topics of interest with professors, as well as with some of the agencies in the city when the students' projects concern local community problems.

The teachers indicated that most students take the subjects they would normally take in a more conventional setting, but study topics of their own rather than of the teacher's choosing. If they are not sure what to study, the teachers serve as resource persons and offer suggestions. Students with no interest in an area do not have to study it. Plans call for an environmental studies area which will partially eliminate science as a separate subject and will combine social studies and science in a manner more relevant to students. A creative arts section will begin this year and will include art, music, and writing.

Elementary students are taking industrial arts. Since no teacher was prepared to teach this subject to younger children, the teachers learned along with the students and have now found activities that elementary students are interested in. Thus the teachers have now obtained necessary materials and tools. Home economics includes outdoor cooking, which is very popular with boys as well as girls.

Perhaps one of the most impressive aspects of the school is the spirit of cooperation among the students at all levels. Not only do the teachers and students make an effort to get to know each other, but the older students are generally very willing to answer the younger students' questions about their projects. This means that the effective student-teacher ratio is much higher than it would be in a conventional setting with the same number of teachers and students.

An activity we observed in the science wing illustrates the students' cooperation and their real involvement in the learning process. Each of several students was going to check out for the weekend a baby rabbit from a litter that had been born at the school three weeks before. They were asking the rabbit's owner numerous

questions about such things as diet and temperature for the babies. One girl asked, "Can the rabbit stay with my kitten?" The group discussed this question and determined that it wouldn't be a good idea. So the girl immediately arranged for another student to keep her kitten for the weekend.

Several questions are often repeated to staff members. People want to know how the Wilson approach works in areas like mathematics, how it works with special education students, and what the difficulties are in securing college admission without the usual grade point averages and class ranks. First, in mathematics a programmed sequence is used so that each student can work at his own speed and level. When he decides he'd like to work on math, he talks with his math teacher, who gives him the unit that he and the teacher have decided on. When he completes the unit, the student asks his teacher for the unit test. If he has problems with the unit, his teacher is available for consultation. On the day of our visit, some students wanted help with division, so they set up an appointment with their teacher for the following day.

One of the teachers who had taught special education when the school had operated more conventionally could answer the question on her subject: she commented that at first she had feared for her students' survival under the new program. Now her students are indistinguishable from the others and participate in the same activities the others do. Occasionally a colleague will come to her with news of an outstanding job that one of her former pupils is doing. The teacher herself is not considered a special education teacher anymore, and she participates in all phases of the program as do her colleagues. Another former special education teacher related an experience with one of her students who had special problems in reading. This student liked to be able to come whenever he wanted to and work on reading. Consequently, he spent more time on reading than he probably would have under a conventional system. The teacher said this boy showed the best progress she had ever seen in a student with his reading difficulties.

The administration of the Wilson Campus School realized that the usual grade and class rank information required by colleges of applicants for admission would not be available for Wilson's graduates. Not wishing to hurt their students' chances for admission, they sent letters to a random selection of colleges and universities regarding enrollment without the usual selection criteria. The response from the colleges indicated that the absence of grades would not present any difficulties, so long as sufficient information would be provided for the college to make an appropriate evaluation of the student. This necessary information comes from teachers' descriptions of their diagnoses of individual students' needs and the prescriptions of the courses to be followed to meet those needs. Each student selects an advisor from among the entire staff, and this teacher helps the student make wise choices and evaluates his accomplishments in regard to his interests, needs, and abilities. Students applying for admission are being accepted at the colleges of their choice. About 65 percent of Wilson's students do enter college.

We do not have space to relate all of the innovations to be found at Wilson. For a better description (but not a perfect one, for as Glines says, things change so fast that anything written is out of date almost before it is published) send \$5 for a copy of Implementing Different and Better Schools by Don E. Glines to Campus Publishers, Box 1005, Mankato, Minnesota 56001. A better procedure is to visit the school and observe it firsthand. The school averages about 100 visitors per week, so you might arrange your visit ahead of time. Mankato is about 80 miles south of Minneapolis.

The school is the only one of its kind that we know of, but one that offers great promise as an alternative to present educational practices. If you know of any others, we'd appreciate hearing about them. We believe each school district should offer this type of alternative, and Glines' book gives some practical suggestions as to how to institute such a program. Preparing teachers for such a school is our task--one we eagerly look forward to . . . and we thought our Burbank Class (see the article by John Thompson in ESCP Newsletter 21) was innovative!

Other reports could have been included, some more recent than these two which range from 9 to 18 months out of date, but they do provide samplings of the nationwide interest in change, along with the other publications about Wilson previously mentioned; they do give additional opinions of Wilson by "neutral" observers, and hopefully do encourage many more to try. If during the 60's, this school along with the many others located in almost every state in the country, managed to achieve rapid change within the usual parameters of any public school district--cost, generally conservative community attitude, traditional facilities, inherited staff and students, rigid state financial regulations, limited flexibility in funds, state department and college entrance rituals, and scholarship awards and athletic eligibility--in other words, all the usual rules, regulations, and requirements that have continually hampered education--then hopefully the ability to develop these different schools throughout the United States will give others the courage to reach out and go far beyond what has been accomplished to date.

Remember, the programs which have been described in these pages are practical, workable models for public schools. They can be achieved within the present public school system. The entire book has stressed this point--reform the North American public school system now--it can be done. A number of church affiliated schools have been able to achieve dramatic success within their restrictions too. And, of course, persons who are able to start or participate in the current private "free schools" movement can go far beyond the suggestions in this book. But the author believes in free public schools; thus the focus of this manuscript is on changing the local public district and the nearby "neighborhood" school.

Now that these individual and national breakthroughs have occurred, perhaps more creative and committed educators, social scientists, and others will help lead some schools to the cutting edge of improvement during the 1970's, so that perhaps by the 1980's, we truly will be on the way to solving many of the educational and social ills of the nation. There is still hope--but the dreams are accomplished through action. The words quoted here from the Man of La Mancha so vividly express this belief.

"To dream the impossible dream; to fight the unbearable foe; to bear with unbearable sorrow; to run where the brave dare not go; to right the unrightable wrong; to love pure chaste from afar; to try when your arms are too weary; to reach the unreachable star. This is my quest to follow that star; no matter how hopeless, no matter how far; to fight for the right, without question or pause; to be willing to march into hell for a heavenly cause; and I know if I'll only be true; to this glorious quest; that my heart will be peaceful and calm; when I'm laid to rest. And the world will be better for this; that one man, scorned and covered with scars; still strove with his last ounce of courage, to reach the unreachable stars."

Let history record, that by taking that single step, we as a nation, during the decade of the 70's, were well on the road toward achieving that trip of one thousand miles.

Chapter 24

Literature Answering Why

Books included in this section of the bibliography help to support the position expressed in Section B--that the entire educational system needs complete re-analysis and the introduction of new approaches. Not all the authors agree as to the causes, the nature of the problems, or how to remedy those they describe, but they do try to explain why they see change as a necessity. A number of the books seldom mention education, but instead are sociological or psychological interpretations of the individual and society.

In most all cases, though, the books ask questions about current conditions in the United States. Reading literature of this nature helped the writer develop several of the views expressed in chapters 1-7. They have done the same for many others, and are listed here with the hope that they will aid more educators in the growing campaign to reshape the schools of the nation.

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Chapter 25

Books Suggesting How

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The key is to pull out those ideas which can be moulded into a pattern for a committed person in a given individual school within a specific community. Most all these books illustrate two points in common--that schools do need dramatic revision, and that theory can be put into practice at an amazingly rapid pace.

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There are many other sources of information through periodicals, mimeographed information from schools, pamphlets from national education organizations, and the resource handouts of college professors. Below are listed examples of additional mass bibliographies which may be of value for those interested in change.

Two of the factors in the revision of schools are those of keeping bibliographies current, and then informing teachers, students, and parents about the latest concepts proposed and the newest research available; these types of efforts tend to lend support to an ongoing change philosophy in the continuing attempt to improve.

1. Major Works on Change in Education--An Annotated Bibliography. Institute for Social Change. University of Michigan, Ann Arbor. Havelock, Ed.
2. Bibliography of the Process of Change. Center For Innovation. New York State Department of Education. Albany, New York. Kurland and Miller, Eds.
3. Bibliography on Organizational Trends in Schools. Center for the Study of Instruction. National Education Association. Washington, D.C. Anderson, Ed.
4. New Educational Materials. Citation Press. 50 West 44th Street, New York, New York.
5. New York University List of Books in Education. Citation Press. 50 West 44th Street, New York, New York.
6. Educators Purchasing Master. Volume I: Instructional Materials. Volume II: Instructional Equipment. Fisher Publishing Co. Englewood, Colorado.
7. Learning Directory. Westinghouse Learning Corporation. 100 Park Avenue, New York, New York.
8. EPiE Reports. EPiE Institute. 386 Park Avenue South, New York, New York.
9. Library of Contemporary Education. Riverside, New Jersey.